UNITED STATES PATENT AND TRADEMARK OFFICE

CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469 B2
APPLICATION NO. : 13/248028
DATED : December 30, 2014
INVENTOR(S) : Raleigh et al.

It is certified that error appears in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

On the Title Page

The text in "Related U.S. Application Data" Item (63) [Column 1, and pages 2-4, Columns 1-2] should be replaced with the following:
Continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, now Pat. No. 8,270,310, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, now Pat. No. 8,321,526, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, now Pat. No. 8,355,337, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, now Pat. No. 8,331,901, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, now Pat. No. 8,250,207, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, now Pat. No. 8,270,952, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, now Pat. No. 8,326,958, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009, now Pat. No. 8,229,812, and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, now Pat. No. 8,275,830, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, now Pat. No. 8,406,748, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, now Pat. No. 8,391,834, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, now Pat. No. 8,402,111, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, now Pat. No. 8,346,225, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, now Pat. No. 8,340,634, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a

Signed and Sealed this
Nineteenth Day of February, 2019

Andrei Iancu
Director of the United States Patent and Trademark Office

SAMSUNG-1041
Samsung v. Headwater
IPR2025-00932

continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/247,998, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/248,025, filed on Sep. 28, 2011, said application No. 12/695,019 is a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771, filed on Mar. 2, 2009, said application No. 12/695,020 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,445 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,451 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,455 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/695,021 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/695,980 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, said application No. 13/134,028, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, said application No. 13/134,005, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009,

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The two last lines in "Related U.S. Application Data", Item (60), page 4, Column 2, Lines 41-42 should be deleted:
"... provisional application No. 61/387,547, filed on Sep. 29, 2010"

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of: Raleigh et al.	Patent No.: 8,924,469
Serial No.: 13/248,028	Issue Date: December 30, 2014
Filing Date: September 28, 2011	Conf. No.: 8510
Title: Enterprise Access Control and Accounting Allocation for Access Networks	

Commissioner for Patents
Office of Patent Publication
ATTN: Certificate of Correction Branch
P.O. Box 1450
Alexandria, VA 22313-1450

MISCELLANEOUS COMMUNICATION REGARDING CERTIFICATE OF CORRECTION

Applicant/Patentee (hereinafter, "Applicant") respectfully requests that the Office issue a Certificate of Correction for U.S. Patent No. 8,924,469 to correct typographical errors and omissions in the "Related U.S. Application Data" sections (63) and (60) of the patent. The errors being corrected are the Office's errors.

In the published patent, section (60) [page 4, col. 2] lists the priority provisional applications. This section is correct except for the very last provisional application listed. That application is incorrect and should be deleted:

… provisional application No. 61/387,547, filed on Sep. 29, 2010

In the published patent, section (63) [page 1, col. 1, and pages 2 through 4, cols. 1-2] lists an incorrect and incomplete priority claim, fraught with typographical errors, and not listing the complete priority information as provided in the Supplemental Application Data sheet filed on

September 25, 2013. Rather than try to correct these errors line by line, Applicant is providing a complete and corrected priority claim for section (63) as follows:

Continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, now Pat. No. 8,270,310, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, now Pat. No. 8,321,526, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, now Pat. No. 8,355,337, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, now Pat. No. 8,331,901, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, now Pat. No. 8,250,207, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, now Pat. No. 8,270,952, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, now Pat. No. 8,326,958, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009, now Pat. No. 8,229,812, and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, now Pat. No. 8,275,830, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, now Pat. No. 8,406,748, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, now Pat. No. 8,391,834, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, now Pat. No. 8,402,111, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, now Pat. No. 8,346,225, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, now Pat. No. 8,340,634, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/247,998, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/248,025, filed on Sep. 28, 2011, said application No. 12/695,019 is a continuation-in-part of application No.12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No.12/380,771, filed on Mar. 2, 2009, said application No. 12/695,020 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,445 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,451 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,455 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/695,021 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2,

2009, said application No. 12/695,980 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, said application No. 13/134,028, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, said application No. 13/134,005, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a

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continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, said application No. 13/247,998, filed on Sep. 28, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/247,028, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/248,025, filed on Sep. 28, 2011, said application No. 13/248,025, filed on Sep. 28, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No.

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CONCLUSION

Applicant respectfully requests issuance of the Certificate of Correction to correct the errors in the priority claim. The Office is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: January 11, 2019 By: /James E. Harris/

James E. Harris
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Patent Counsel
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(903) 201-6212

CERTIFICATE OF ELECTRONIC TRANSMISSION

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Date: January 11, 2019 By: /Jennifer Smith/
Jennifer Smith

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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

The two last lines in "Related U.S. Application Data",section (60), page 4, column 2, lines 41-42 should be deleted :

... provisional application No. 61/387,547, filed on Sep. 29, 2010

The text in "Related U.S. Application Data" Section (63) [page 1, col. 1, and pages 2-4, cols. 1-2] should be replaced with the following:

Continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, now Pat. No. 8,270,310, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, now Pat. No. 8,321,526, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, now Pat. No. 8,355,337, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, now Pat. No. 8,331,901, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, now Pat. No. 8,250,207, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, now Pat. No. 8,270,952, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, now abandoned, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, now Pat. No. 8,326,958, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009, now Pat. No. 8,229,812, and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009,

[continued on next page]

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INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, now Pat. No. 8,275,830, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, now Pat. No. 8,406,748, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, now Pat. No. 8,391,834, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, now Pat. No. 8,402,111, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, now Pat. No. 8,346,225, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, now Pat. No. 8,340,634, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/247,998, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/248,025, filed on Sep. 28, 2011, said application No. 12/695,019 is a continuation-in-part of application No.12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No.12/380,771, filed on Mar. 2, 2009, said application No. 12/695,020 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,445 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,451 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/694,455 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/695,021 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, said application No. 12/695,980 is a continuation-in-part of application No. 12/380,780, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010,

[continued on next page]

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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/134,028, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011,

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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/134,005, filed on May 25, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010,

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CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/229,580, filed on Sep. 9, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,771 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011,

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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/237,827, filed on Sep. 20, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011,

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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/239,321, filed on Sep. 21, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011,

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PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/247,998, filed on Sep. 28, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/248,028, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/248,025, filed on Sep. 28, 2011,

[continued on next page]

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PTO/SB/44 (09-07)
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UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

said application No. 13/248,025, filed on Sep. 28, 2011, is a continuation-in-part of application No. 12/380,759, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,779, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,758, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,778, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,768, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,767, filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,780 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,755 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,756 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,770 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,772 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,782 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,783 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,757 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,781 filed on Mar. 2, 2009 and a continuation-in-part of application No. 12/380,774 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,773 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,769 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/380,777 filed on Mar. 2, 2009, and a continuation-in-part of application No. 12/695,019, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,020, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,445, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,451, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/694,455, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,021, filed on Jan. 27, 2010, and a continuation-in-part of application No. 12/695,980, filed on Jan. 28, 2010, and a continuation-in-part of application No. 13/134,005, filed on May 25, 2011, and a continuation-in-part of application No. 13/134,028, filed on May 25, 2011, and a continuation-in-part of application No. 13/229,580, filed on Sep. 9, 2011, and a continuation-in-part of application No. 13/237,827, filed on Sep. 20, 2011, and a continuation-in-part of application No. 13/239,321, filed on Sep. 21, 2011, and a continuation-in-part of application No. 13/248,028, filed on Sep. 28, 2011, and a continuation-in-part of application No. 13/247,998, filed on Sep. 28, 2011.

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Electronic Acknowledgement Receipt	
EFS ID:	34835460
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	James E. Harris/Jennifer Smith
Filer Authorized By:	James E. Harris
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	11-JAN-2019
Filing Date:	28-SEP-2011
Time Stamp:	16:35:25
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Request for Certificate of Correction	P037_ReqforCoC_RTF.pdf	2018424 5d30acb3d942776706fe432158d10d88c20481fd	no	17

Warnings:

Information:	
Total Files Size (in bytes):	2018424

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.
National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.
New International Application Filed with the USPTO as a Receiving Office
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UNITED STATES PATENT AND TRADEMARK OFFICE

CERTIFICATE OF CORRECTION

PATENT NO.	: 8,924,469 B2
APPLICATION NO.	: 13/248028
DATED	: December 30, 2014
INVENTOR(S)	: Raleigh et al.

It is certified that error appears in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

In the claims

In column 55, line 7, the word "communicate" should be changed to "communication"

In column 55, line 11, the word "comprise" should be changed to "comprises"

In column 55, line 37, the phrase "assist in the presenting" should be changed to "assist in presenting"

Signed and Sealed this
Fourteenth Day of June, 2016

Michelle K. Lee

Michelle K. Lee
Director of the United States Patent and Trademark Office

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Patent No.: 8,924,469
Serial No.:	13/248,028	Issue Date: December 30, 2014
Filing Date:	September 28, 2011	Conf. No.: 8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks	

Commissioner for Patents
Office of Data Management
ATTN: Certificate of Correction Branch
P.O. Box 1450
Alexandria, VA 22313-1450

MISCELLANEOUS COMMUNICATION REGARDING CERTIFICATE OF CORRECTION

Applicant/Patentee (hereinafter, "Applicant") respectfully requests that the Office issue a Certificate of Correction for U.S. Patent No. 8,924,469 to correct typographical errors in claims 1, 2, and 6. The errors being corrected are the Office's error.

In Applicant's amendment filed on April 2, 2013, claim 1, last sentence, recites:

1. …

a **communication** interface enabling the first set of one or more elements to communicate with the second set of one or more elements.

But in the issued patent, claim 1 recites:

1. …

a **communicate** interface enabling the first set of one or more elements to communicate with the second set of one or more elements.

The word "communicate" should be changed to "communication."

In Applicant's amendment filed on April 2, 2013, claim 2 recites:

2. The network system recited in claim 1, wherein the first set of one or more elements **comprises** a first service design center, and further comprising a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set.

But in the issued patent, claim 2 recites:

2. The network system recited in claim 1, wherein the first set of one or more elements **comprise** a first service design center, and further comprising a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set.

The word "comprise" should be changed to "comprises."

In Applicant's amendment filed on April 2, 2013, claim 6 recites:

6. The network system recited in claim 1, wherein the user interface is a user interface of the end-user device, and wherein at least assist in presenting the notification information through the user interface comprises send at least a portion of the notification information to the end-user device.

But in the issued patent, claim 6 recites:

6. The network system recited in claim 1, wherein the user interface is a user interface of the end-user device, and wherein at least assist in **the** presenting the notification information through the user interface comprises send at least a portion of the notification information to the end-user device.

The word "the" should be deleted from the phrase "as least assist in the presenting."

CONCLUSION

Applicant respectfully requests issuance of the Certificate of Correction to correct the typographical errors in claims 1, 2, and 6. The Office is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: April 21, 2016

By: /James E. Harris/

James E. Harris
Reg. No. 40,013
Headwater Partners I LLC
1011 Pruitt Place
Tyler, TX 75703
(512) 970-9135

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: April 21, 2016 By: /Ann Taylor/
Ann Taylor

PTO/SB/44 (09-07)
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(Also Form PTO-1050)

UNITED STATES PATENT AND TRADEMARK OFFICE
CERTIFICATE OF CORRECTION

PATENT NO. : 8,924,469

APPLICATION NO.: 13/248,028

ISSUE DATE : December 30, 2014

INVENTOR(S) : Raleigh et al.

It is certified that an error appears or errors appear in the above-identified patent and that said Letters Patent is hereby corrected as shown below:

In column 55, line 7, the word "communicate" should be changed to "communication"

In column 55, line 11, the word "comprise" should be changed to "comprises"

In column 55, line 37, the phrase "assist in the presenting" should be changed to "assist in presenting"

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Redwood City, CA 94065

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8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspection or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt	
EFS ID:	25558802
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	James E. Harris/Ann Taylor
Filer Authorized By:	James E. Harris
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	21-APR-2016
Filing Date:	28-SEP-2011
Time Stamp:	14:30:26
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Request for Certificate of Correction	P037_ReqCoC.pdf	68940 6dd8641e37d62ab9cbbd0adc8f6672fbb6862d87	no	3
Warnings:					
Information:					

2	Request for Certificate of Correction	P037_CoCForm.pdf	164458 08252a64e6d1de41d336198f27a1467642a603ed	no	2
Warnings:					
Information:					
			Total Files Size (in bytes):	233398	

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If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

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APPLICATION NO.	ISSUE DATE	PATENT NO.	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	12/30/2014	8924469	RALEP037 [26WV-160514]	8510

107265 7590 12/10/2014

Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

ISSUE NOTIFICATION

The projected patent number and issue date are specified above.

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)
(application filed on or after May 29, 2000)

The Patent Term Adjustment is 0 day(s). Any patent to issue from the above-identified application will include an indication of the adjustment on the front page.

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Application Assistance Unit (AAU) of the Office of Data Management (ODM) at (571)-272-4200.

APPLICANT(s) (Please see PAIR WEB site http://pair.uspto.gov for additional applicants):

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

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Issue Classification	Application/Control No.	Applicant(s)/Patent under Reexamination	
	13/248,028	RALEIGH ET AL.	
	Examiner	Art Unit	
	ANDREW JOSEPH RUDY	3687	

Change(s) applied
to document;
/L.A.S./
9/4/2014

ISSUE CLASSIFICATION

ORIGINAL CLASS	ORIGINAL SUBCLASS	CROSS REFERENCE(S) CLASS	CROSS REFERENCE(S) SUBCLASS (ONE SUBCLASS PER BLOCK)
709	203	709	224
INTERNATIONAL CLASSIFICATION		455	406
G 0 6 F	15/173		
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XXXXXXXXXXXXXXXXXXX (Assistant Examiner) (Date)	/Andrew Joseph Rudy/ 7/10/2014 (Primary Examiner) (Date)	Total Claims Allowed: 47
(Legal Instruments Examiner) (Date)		O.G. Print Claim(s): 1 / O.G. Print Fig.: 1

☐ Claims renumbered in the same order as presented by applicant ☐ CPA ☐ T.D. ☐ R.1.47

Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original
1	1	31	31		61		91		121		151		181
2	2	32	32		62		92		122		152		182
3	3	33	33		63		93		123		153		183
4	4	34	34		64		94		124		154		184
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6	6	36	36		66		96		126		156		186
7	7	37	37		67		97		127		157		187
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30	30		60		90		120		150		180		210

U.S. Patent and Trademark Office

Part of Paper No. 20140710

PTO/SB/08a (07-09)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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Substitute for form 1449A/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 8 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		2006/0034256	02-16-2006	ADDAGATLA et al	
		2006/0040642	02-23-2006	BORIS et al	
		2006/0045245	03-02-2006	AARON et al	
		2006/0048223	03-02-2006	LEE et al	
		2006/0072646	04-06-2006	FEHER et al	
		2006/0085543	04-01-2006	HRASTAR et al	
		2006/0112016	05-25-2006	ISHIBASHI	
		2006/0143098	06-29-2006	LAZARIDIS	
		2006/0165060	07-27-2006	DUA, Robin	
		~~2006/0178917~~	08-10-2006	MIKURAK	20060178918
		2006/0178918	08-10-2006	MIKURAK	
		2006/0183462	08-17-2006	KOLEHMAINEN et al	
		2006/0190314	08-24-2006	HERNANDEZ	
		2006/0199608	09-07-2006	DUNN et al	
		2006/0206904	09-14-2006	WATKINS et al	
		2006/0218395	09-28-2006	MAES	
		2006/0233108	10-19-2006	KRISHNAN, Murali R.	
		2006/0233166	10-19-2006	BOU-DIAB et al	
		2006/0236095	10-19-2006	SMITH et al	
		2006/0242685	10-26-2006	HEARD et al	

Change(s) applied to document,
/C.C.B./
9/12/2014

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]
	F22	WO 2008/017837 A1	02-14-2008	Symbian Software Limited		
	F23	WO 2008/051379 A2	05-02-2008	Verizon Services Corp.		
	F24	WO 2008/066419 A1	06-05-2008	Telefonaktiebolaget LM Ericsson		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. [1]Applicant's unique citation designation number (optional). [2]See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. [3]Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4]For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5]Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. [6]Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 2 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		6,658,254	12-02-2003	PURDY et al.	
		6,684,244	01-27-2004	GOLDMAN et al	
		6,725,031	04-20-2004	WATLER et al	
		6,785,889	08-31-2004	WILLIAMS, Peter	
		6,829,696	12-07-2004	BALMER et al	
		6,920,455	07-19-2005	WESCHLER, Paul	
		6,952,428	10-04-2005	NECKA et al	
		6,965,667	11-15-2005	TRABANDT et al	
		6,996,076	02-07-2006	FORBES et al	
		6,998,985	02-14-2006	REISMAN et al	
		7,027,408	04-11-2006	NABKEL, et al.	
		7,042,988	05-09-2006	JUITT et al	
		7,058,968	06-06-2006	ROWLAND et al	
		7,092,696	08-15-2006	HOSAIN et al	
		7,142,876	11-28-2006	TROSSEN et al	
		7,158,792	01-02-2007	COOK et al	
		7,174,174	02-06-2007	BORIS et al	
		7,180,855	02-20-2007	LIN	
		7,197,321	03-27-2007	ERSKINE et al	
		7,242,920	~~04-10-2007~~	MORRIS, Robert P.	07/2007

Change(s) applied to document,
/C.C.R./
9/12/2014

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]
	F04	EP 1978772 A1	10-08-2008	British Telecomm. Public Ltd. Co.		
	F05	WO 1999/065185 A3	12-16-1999	British Telecomm. Public Ltd. Co.		
	F06	WO 2003/014891 A2	02-20-2003	The Boeing Company		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. [1]Applicant's unique citation designation number (optional). [2]See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. [3]Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4]For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5]Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. [6]Applicant is to place a check mark here if English language Translation is attached.

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ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	6782412		2004-08-24	Brophy, Kevin et al.	
	21	6081591		2000-06-27	Skoog, Frederick H.	
	22	6064878		2000-05-16	Denker, John Stewart et al.	
	23	7730123		2010-06-01	Erickson, Richard R. et al.	
	24	8024397		2011-09-20	Erickson, Richard R. et al.	
	25	8156206		2012-04-10	Kiley, Kevin J. et al.	
	26	8126722		2012-02-28	Robb, Terence Alan et al.	
	27	8315594		2012-11-20	MAUSER, Edward Ronald et al.	
	28	8353001		2013-01-08	HERROD, Allan	
	29	8195093		~~2013-08-05~~ 06/2012	GARRETT, Darrin et al.	
	30	8036600		2011-10-11	GARRETT, Darrin et al.	

Change(s) applied to document, /C.C.B./ 9/15/2014

EFS Web 2.1.17

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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Sheet 11 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		2008/0098062	04-24-2008	BALIA	
		2008/0109679	05-08-2008	WRIGHT et al	
		2008/0120688	05-22-2008	QIU et al	
		2008/0127304	05-29-2008	GINTER et al	
		2008/0130534	06-28-2005	TOMIOKA, Tazuko	
		2008/0130656	06-05-2008	KIM et al	
		2008/0132268	06-05-2008	CHOI-GROGAN et al	
		2008/0134330	06-05-2008	KAPOOR et al	
		2008/0147454	06-19-2008	WALKER et al.	
		2008/0160958	~~04-03-2008~~	ABICHANDANI et al	07/2008
Change(s) applied to document, /C.C.B./ 9/15/2014		2008/0162637	07-03-2008	ADAMCZYK et al	
		2008/0162704	~~04-03-2008~~	POPLETT et al	07/2008
		2008/0164304	07-10-2008	NARASIMHAN	
		2008/0167027	07-10-2008	GAUTIER et al	
		2008/0167033	07-10-2008	BECKERS, Michel	
		2008/0168523	07-10-2008	ANSARI et al	
		2008/0177998	07-24-2008	APSANGI et al	
		2008/0183812	07-31-2008	PAUL et al	
		2008/0189760	08-07-2008	ROSENBERG et al	
		2008/0207167	08-28-2008	BUGENHAGEN	

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] *(if known)*	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

107265 7590 07/15/2014
Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission
I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

Ann Taylor	(Depositor's name)
/Ann Taylor/ (via EFS-web)	(Signature)
November 4, 2014	(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$0	$0	$890	$0	10/15/2014

EXAMINER	ART UNIT	CLASS-SUBCLASS
RUDY, ANDREW J	3687	705-032000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).
☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list
(1) The names of up to 3 registered patent attorneys or agents OR, alternatively,
(2) The name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

1 James E. Harris
2 Krista S. Jacobsen
3

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE: Headwater Partners I LLC

(B) RESIDENCE: (CITY and STATE OR COUNTRY): Redwood City, CA

Please check the appropriate assignee category or categories (will not be printed on the patent) : ☐ Individual ☒ Corporation or other private group entity ☐ Government

4a. The following fee(s) are submitted:
☐ Issue Fee
☐ Publication Fee (No small entity discount permitted)
☐ Advance Order - # of Copies _____

4b. Payment of Fee(s): **(Please first reapply any previously paid issue fee shown above)**
☐ A check is enclosed.
☐ Payment by credit card. Form PTO-2038 is attached.
☒ The Director is hereby authorized to charge the required fee(s), any deficiency, or credits any overpayment, to Deposit Account Number 505876 (enclose an extra copy of this form).

5. **Change in Entity Status** (from status indicated above)
☐ Applicant certifying micro entity status. See 37 CFR 1.29 — NOTE: Absent a valid certification of Micro Entity Status (see forms PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.
☐ Applicant asserting small entity status. See 37 CFR 1.27 — NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.
☐ Applicant changing to regular undiscounted fee status. — NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: This form must be signed in accordance with 37 CFR 1.31 and 1.33. See 37 CFR 1.4 for signature requirements and certifications.

Authorized Signature /James E. Harris/ Date November 4, 2014
Typed or printed name James E. Harris Registration No. 40013

PTOL-85 Part B (10-13) Approved for use through 10/31/2013. OMB 0651-0033 U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	James E. Harris/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Small Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pet. Revive Abandon App, Delay Pymt-Resp	2453	1	850	850
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
			Total in USD ($)	**850**



UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

Decision Date : November 4, 2014

In re Application of :

Gregory Raleigh

Application No : 13248028

Filed : 28-Sep-2011

Attorney Docket No : RALEP037 [26WV-160514]

DECISION ON PETITION

UNDER CFR 1.137(a)

This is an electronic decision on the petition under 37 CFR 1.137(a), filed November 4, 2014 , to revive the above-identified application.

The petition is **GRANTED.**

The above-identified application became abandoned for failure to reply in a timely manner to the Notice of Allowance and Issue Fee(s) Due. The date of abandonment is the day after the expiration date of the period set for reply in the Notice.

The electronic petition satisfies the conditions for revival pursuant to the provisions of 37 CFR 1.137(a) in that (1) the reply in the form of payment of the Issue Fee and the Publication Fee (if necessary); (2) the petition fee as set forth in 37 CFR 1.17 (m); (3) the drawing correction and/or other deficiencies (if necessary); and (4) the required statement of unintentional delay have been received. Accordingly, the Issue Fee payment is accepted as having been unintentionally delayed.

Telephone inquiries concerning this decision should be directed to the Patent Electronic Business Center (EBC) at 866-217-9197.

This application file is being directed to the Office of Data Management.

Office of Petitions

Electronic Acknowledgement Receipt	
EFS ID:	20604602
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	James E. Harris/Ann Taylor
Filer Authorized By:	James E. Harris
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	04-NOV-2014
Filing Date:	28-SEP-2011
Time Stamp:	16:30:26
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$850.0
RAM confirmation Number	2877
Deposit Account	505876
Authorized User	
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.16 (National application filing, search, and examination fees) Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees)	

Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees)	
Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees)	
Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)	

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Petition automatically granted by EFS	petition-request.pdf	32037 65c1b10893ac6118ecfadbaaa3182b0063c5e354	no	2
Warnings:					
Information:					
2	Issue Fee Payment (PTO-85B)	P037IssueFeeTrans.pdf	122185 74e49c917779137f811d1ed820abd43d19978f2a	no	1
Warnings:					
Information:					
3	Fee Worksheet (SB06)	fee-info.pdf	30400 41c83701679f9d06673076c5fb2adb2f6d564add	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	184622		

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: PET.AUTO Document Description: Petition automatically granted by EFS-Web	PTO/SB/64 U.S. Patent and Trademark Office Department of Commerce

Electronic Petition Request	PETITION FOR REVIVAL OF AN APPLICATION FOR PATENT ABANDONED UNINTENTIONALLY UNDER 37 CFR 1.137(a)
Application Number	13248028
Filing Date	28-Sep-2011
First Named Inventor	Gregory Raleigh
Art Unit	3687
Examiner Name	ANDREW RUDY
Attorney Docket Number	RALEP037 [26WV-160514]
Title	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

The above-identified application became abandoned for failure to file a timely and proper reply to a notice or action by the United States Patent and Trademark Office. The date of abandonment is the day after the expiration date of the period set for reply in the office notice or action plus any extensions of time actually obtained.

APPLICANT HEREBY PETITIONS FOR REVIVAL OF THIS APPLICATION

NOTE: A grantable petition requires the following items:
(1) Petition fee;
(2) Reply and/or issue fee;
(3) Terminal disclaimer with disclaimer fee – required for all utility and plant applications filed before June 8, 1995; and for all design applications;
(4) Statement that the entire delay was unintentional.

Petition Fee

◉	Small Entity
◯	Micro Entity
◯	Regular Undiscounted

Issue Fee and Publication Fee :

Issue Fee and Publication Fee are not due.

☒ Issue Fee Transmittal is attached

Drawing corrections and/ or other deficiencies.

◉ Drawing corrections and/ or other deficiencies are not required ○ I certify, in accordance with 37 CFR 1.4.(d)(4), that drawing corrections and/ or other deficiencies have previously been filed on ○ Drawing corrections and/ or other deficiencies are attached. ☒ STATEMENT: The entire delay in filing the required reply from the due date for the required reply until the filing of a grantable petition under 37 CFR 1.137(a) was unintentional.
THIS PORTION MUST BE COMPLETED BY THE SIGNATORY OR SIGNATORIES I certify, in accordance with 37 CFR 1.4(d)(4) that I am: ◉ An attorney or agent registered to practice before the Patent and Trademark Office who has been given power of attorney in this application. ○ An attorney or agent registered to practice before the Patent and Trademark Office, acting in a representative capacity. ○ A sole inventor ○ A joint inventor; I certify that I am authorized to sign this submission on behalf of all of the inventors as evidenced by the power of attorney in the application ○ A joint inventor; all of whom are signing this e-petition.

Signature	/James E. Harris/
Name	James E. Harris
Registration Number	40013

Best Available Copy

TFW

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

107265 7590 07/15/2014
Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065



Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission
I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

Ann Taylor	(Depositor's name)
/Ann Taylor/ (via EFS-web)	(Signature)
November 4, 2014	(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$0	$0	$890	$0	10/15/2014

11/05/2014 HVUONG2 00000024 505876 13248028

EXAMINER	ART UNIT	CLASS-SUBCLASS
RUDY, ANDREW J	3687	705-032000

01 FC:2501 480.00 DA
02 FC:1508 410.00 DA

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).
☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list
(1) The names of up to 3 registered patent attorneys or agents OR, alternatively,
(2) The name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

1 James E. Harris
2 Krista S. Jacobsen
3

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE: Headwater Partners I LLC

(B) RESIDENCE: (CITY and STATE OR COUNTRY): Redwood City, CA

Please check the appropriate assignee category or categories (will not be printed on the patent): ☐ Individual ☒ Corporation or other private group entity ☐ Government

4a. The following fee(s) are submitted:
☐ Issue Fee
☐ Publication Fee (No small entity discount permitted)
☐ Advance Order - # of Copies _____

4b. Payment of Fee(s): **(Please first reapply any previously paid issue fee shown above)**
☐ A check is enclosed.
☐ Payment by credit card. Form PTO-2038 is attached.
☒ The Director is hereby authorized to charge the required fee(s), any deficiency, or credits any overpayment, to Deposit Account Number 505876 (enclose an extra copy of this form).

5. **Change in Entity Status** (from status indicated above)
☐ Applicant certifying micro entity status. See 37 CFR 1.29
NOTE: Absent a valid certification of Micro Entity Status (see forms PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.
☐ Applicant asserting small entity status. See 37 CFR 1.27
NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.
☐ Applicant changing to regular undiscounted fee status.
NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: This form must be signed in accordance with 37 CFR 1.31 and 1.33. See 37 CFR 1.4 for signature requirements and certifications.

Authorized Signature /James E. Harris/ Date November 4, 2014
Typed or printed name James E. Harris Registration No. 60,134

Adjustment date: 11/05/2014 HVUONG2
09/13/2013 HNGUYEN1 00005527 505876 13248028
01 FC:2501 -890.00 CR

PTOL-85 Part B (10-13) Approved for use through 10/31/2013. OMB 0651-0033 U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

7590 10/30/2014

Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	
ART UNIT	PAPER NUMBER
3687	
NOTIFICATION DATE	DELIVERY MODE
10/30/2014	ELECTRONIC

Notice of Abandonment

This application is abandoned in view of:

1. ☐ The applicant's failure to timely file a proper reply to the Office letter mailed on _____.
   (a) ☐ A reply was received on _____ (with a Certificate of Mailing or Transmission date _____), which is after the expiration of the period for reply (including a total extension of ____ month(s)) which expired on _____.
   (b) ☐ No reply has been received.
2. ☑ Applicant's failure to timely pay the required issue fee and publication fee, if applicable, within the statutory period of three months from the mailing date of the Notice of Allowance (PTOL-85).
   (a) ☐ The issue fee and publication fee, if applicable, was received on _____ (with a Certificate of Mailing or Transmission date _____), which is after the expiration of the statutory period for payment of the issue fee (and publication fee) set in the Notice of Allowance (PTOL-85).
   (b) ☐ The submitted fee of $_____ is insufficient. A balance of $_____ is due.
   The issue fee required by 37 CFR 1.18 is $_____.
   The publication fee, if required by 37 CFR 1.18(d), is $_____.
   (c) ☑ The issue fee and publication fee, if applicable, has not been received.
3. ☐ Applicant's failure to timely file corrected drawings as required by, and within the three-month period set in, the Notice of Allowability (PTO-37).
   (a) ☐ Proposed corrected drawings were received on _____ (with a Certificate of Mailing or Transmission dated _____), which is after the expiration of the period for reply.
   (b) ☐ No corrected drawing have been received.
4. ☐ Applicant's failure to timely file the inventor's oath or declaration no later than the date on which the issue fee was paid as required by the Notice Requiring Inventor's Oath or Declaration (PTO-2306).
   (a) ☐ An inventor's oath or declaration was received on _____ (with a Certificate of Mailing or Transmission date _____), which is after the date on which the issue fee was paid.
   (b) ☐ While an oath or declaration (or substitute statement) for one or more inventors was received, an oath or declaration (or substitute statement) for at least one other inventor has not been received.
   (c) ☐ No inventor's oath or declaration has been received.
5. ☐ Drawings received on _____ were disapproved by examiner. See examiner's response dated _____.
6. ☐ Corrected drawings were received on _____ , which is after the expiration of the one-month period for reply set in examiner's response dated _____.
7. ☐ No corrected drawings have been received in reply to one-month period set in examiner's response dated _____.
8. ☐ The reason(s) below:

Petitions to revive under 37 CFR 1.137(a) or (b), or request to withdraw the holding of abandonment under 37 CFR 1.181, should be promptly filed to minimize any negative effects on patent term.

/Brandi Tyler for

(571)-272-4200 or 1(888)-786-0101
Patent Publication Branch
Office of Data Management

FORM PTO-ABN0 (Rev. 06/09)

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

NOTICE OF ALLOWANCE AND FEE(S) DUE

107265 7590 07/15/2014
Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	
ART UNIT	PAPER NUMBER
3687	

DATE MAILED: 07/15/2014

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$0	$0	$890	$0	10/15/2014

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the ENTITY STATUS shown above. If the ENTITY STATUS is shown as SMALL or MICRO, verify whether entitlement to that entity status still applies.

If the ENTITY STATUS is the same as shown above, pay the TOTAL FEE(S) DUE shown above.

If the ENTITY STATUS is changed from that shown above, on PART B - FEE(S) TRANSMITTAL, complete section number 5 titled "Change in Entity Status (from status indicated above)".

For purposes of this notice, small entity fees are 1/2 the amount of undiscounted fees, and micro entity fees are 1/2 the amount of small entity fees.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

107265 7590 07/15/2014
Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission
I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

(Depositor's name)
(Signature)
(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$0	$0	$890	$0	10/15/2014

EXAMINER	ART UNIT	CLASS-SUBCLASS
RUDY, ANDREW J	3687	705-032000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).
- ❑ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
- ❑ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list
(1) The names of up to 3 registered patent attorneys or agents OR, alternatively,
(2) The name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.
1 _____
2 _____
3 _____

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE (B) RESIDENCE: (CITY and STATE OR COUNTRY)

Please check the appropriate assignee category or categories (will not be printed on the patent) : ❑ Individual ❑ Corporation or other private group entity ❑ Government

4a. The following fee(s) are submitted:
- ❑ Issue Fee
- ❑ Publication Fee (No small entity discount permitted)
- ❑ Advance Order - # of Copies _____

4b. Payment of Fee(s): **(Please first reapply any previously paid issue fee shown above)**
- ❑ A check is enclosed.
- ❑ Payment by credit card. Form PTO-2038 is attached.
- ❑ The Director is hereby authorized to charge the required fee(s), any deficiency, or credits any overpayment, to Deposit Account Number _____ (enclose an extra copy of this form).

5. **Change in Entity Status** (from status indicated above)
- ❑ Applicant certifying micro entity status. See 37 CFR 1.29 — NOTE: Absent a valid certification of Micro Entity Status (see forms PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.
- ❑ Applicant asserting small entity status. See 37 CFR 1.27 — NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.
- ❑ Applicant changing to regular undiscounted fee status. — NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: This form must be signed in accordance with 37 CFR 1.31 and 1.33. See 37 CFR 1.4 for signature requirements and certifications.

Authorized Signature _____ Date _____

Typed or printed name _____ Registration No. _____

PTOL-85 Part B (10-13) Approved for use through 10/31/2013. OMB 0651-0033 U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 07/15/2014

Headwater Partners I LLC - Outside Firm 1
555 Twin Dolphin Drive, Suite 310
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	

ART UNIT	PAPER NUMBER
3687	

DATE MAILED: 07/15/2014

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)
(Applications filed on or after May 29, 2000)

The Office has discontinued providing a Patent Term Adjustment (PTA) calculation with the Notice of Allowance.

Section 1(h)(2) of the AIA Technical Corrections Act amended 35 U.S.C. 154(b)(3)(B)(i) to eliminate the requirement that the Office provide a patent term adjustment determination with the notice of allowance. See Revisions to Patent Term Adjustment, 78 Fed. Reg. 19416, 19417 (Apr. 1, 2013). Therefore, the Office is no longer providing an initial patent term adjustment determination with the notice of allowance. The Office will continue to provide a patent term adjustment determination with the Issue Notification Letter that is mailed to applicant approximately three weeks prior to the issue date of the patent, and will include the patent term adjustment on the patent. Any request for reconsideration of the patent term adjustment determination (or reinstatement of patent term adjustment) should follow the process outlined in 37 CFR 1.705.

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

OMB Clearance and PRA Burden Statement for PTOL-85 Part B

The Paperwork Reduction Act (PRA) of 1995 requires Federal agencies to obtain Office of Management and Budget approval before requesting most types of information from the public. When OMB approves an agency request to collect information from the public, OMB (i) provides a valid OMB Control Number and expiration date for the agency to display on the instrument that will be used to collect the information and (ii) requires the agency to inform the public about the OMB Control Number's legal significance in accordance with 5 CFR 1320.5(b).

The information collected by PTOL-85 Part B is required by 37 CFR 1.311. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, Virginia 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450. Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether disclosure of these records is required by the Freedom of Information Act.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspection or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Notice of Allowability	Application No. 13/248,028	Applicant(s) RALEIGH ET AL.	
	Examiner ANDREW JOSEPH RUDY	Art Unit 3687	AIA (First Inventor to File) Status No

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *the 09 October 2014 RCE*.
   ☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were filed on_____.
2. ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.
3. ☒ The allowed claim(s) is/are *1-17 and 26-55*. As a result of the allowed claim(s), you may be eligible to benefit from the **Patent Prosecution Highway** program at a participating intellectual property office for the corresponding application. For more information, please see http://www.uspto.gov/patents/init_events/pph/index.jsp or send an inquiry to PPHfeedback@uspto.gov .
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

   Certified copies:

   a) ☐ All b) ☐ Some *c) ☐ None of the:
      1. ☐ Certified copies of the priority documents have been received.
      2. ☐ Certified copies of the priority documents have been received in Application No. _____ .
      3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

   * Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
   ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

   Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☒ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date _____
3. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
4. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____ .
5. ☒ Examiner's Amendment/Comment
6. ☒ Examiner's Statement of Reasons for Allowance
7. ☐ Other _____.

DETAILED ACTION

Notice of Pre-AIA or AIA Status

1. The present application is being examined under the pre-AIA first to invent provisions.

Continued Examination Under 37 CFR 1.114

2. A request for continued examination (RCE) under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after allowance or after an Office action under *Ex Parte Quayle*, 25 USPQ 74, 453 O.G. 213 (Comm'r Pat. 1935). Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, prosecution in this application has been reopened pursuant to 37 CFR 1.114. Applicant's submission filed on October 9, 2013 has been entered.

3. Applicant cancelled claims 18-25. Claims 1-17 and 26-55 are pending.

4. Further pertinent references are noted on the attached PTO-892.

5. Applicant's Information Disclosure Statements (IDS's) submitted October 9, 2013; November 26, 2013; January 31, 2014; March 19, 2014 and May 22, 2014 have been reviewed. Note the attached IDS's.

Allowable Subject Matter

6. Claims 1-17 and 26-55 are allowed.

The following is an examiner's statement of reasons for allowance: The prior art of record, either alone or in combination, does not disclose, or suggest, Applicant's claim language. It is noted that the claims have been reviewed in light of Alice Corporation Pty. Ltd. v. CLS Bank International, et al., 573 U. S. ___ (2014).

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW JOSEPH RUDY whose telephone number is (571)272-6789. The examiner can normally be reached on Monday thru Friday.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ANDREW JOSEPH RUDY/

Primary Examiner

Art Unit 3687

Notice of References Cited	Application/Control No. 13/248,028	Applicant(s)/Patent Under Reexamination RALEIGH ET AL.	
	Examiner ANDREW JOSEPH RUDY	Art Unit 3687	Page 1 of 1

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*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Name	Classification
*	A	US-7,805,140	09-2010	Friday et al.	455/436
*	B	US-7,877,090	01-2011	Maes, Stephane H.	455/432.1
*	C	US-8,605,691	12-2013	Soomro et al.	370/338
*	D	US-8,655,357	02-2014	Gazzard et al.	455/435.1
	E	US-			
	F	US-			
	G	US-			
	H	US-			
	I	US-			
	J	US-			
	K	US-			
	L	US-			
	M	US-			

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	X	

*A copy of this reference is not being furnished with this Office action. (See MPEP § 707.05(a).)
Dates in MM-YYYY format are publication dates. Classifications may be US or foreign.

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	5983270	A	1999-11-09	Abraham et al.	
	2	6598034	B1	2003-07-22	Kloth, Axel K.	
	3	6748195	B1	2004-06-08	Phillips, W. Garland	
	4	6873988	B2	2005-03-29	Herrmann et al.	
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	7	7043268	B2	2006-05-09	Yukie et al.	
	8	7113780	B2	2006-09-26	Mckenna Daniel et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	9	7203169	B1	2007-04-10	Okholm, Jon et al.	
	10	7286834	B2	2007-10-23	Walter	
	11	7460837	B2	2008-12-02	Diener, Neil R.	
	12	7540408	B2	2009-06-02	Levine, Judah et al.	
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	20	7697540	B2	2010-04-13	Haddad et al.	
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	Attorney Docket Number	RALEP037 [26WV-160514]

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	34	8185088	B2	2012-05-22	Klein et al.	
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Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
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	2	1802839A	CN		2006-07-12	Motorola Inc.		☐
	3	2004064306	WO		2004-07-29	Motorola Inc.		☐
	4	2007068288	WO		2007-06-21	Telefonaktiebolaget LM Ericsson		☐

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	1	"The Construction of Intelligent Residential District in Use of Cable Television Network," Shandong Science, Vol. 13, No. 2, June 2000	☐

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Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

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Attorney Docket Number	RALEP037 [26WV-160514]

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Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8351898		2013-01-08	Raleigh, Gregory G.	
	2	7929959		2011-04-19	DeAtley, Dallas et al.	

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	1	20120155296		2012-06-21	Kashanian, Nematolah	
	2	20120330792		2012-12-27	Kashanian, Nematolah	
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	1	101115248A	CN		2008-01-30	Lenovo Beijing Ltd.		☐
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	1	VerizonWireless.com news, "Verizon Wireless Adds to Portfolio of Cosumer-Friendly Tools With Introduction of Usage Controls, Usage Controls and Chaperone 2.0 Offer Parents Full Family Security Solution," August 18, 2008	☐

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Doc description: Information Disclosure Statement (IDS) Filed

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Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	5774532	A	1998-06-30	Gottlieb et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20040225898	A	2004-11-11	Frost, D. et al.	
	2	20050079863	A	2005-04-14	Macaluso, Anthony G.	
	3	20060114832	A	2006-06-01	Hamilton et al.	
	4	20060156398	A	2006-07-13	Ross et al.	
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	6	20070033194	A	2007-02-08	Srinivas et al.	
	7	20080070550	A	2008-03-20	Hose, David Alan	
	8	20080201266	A	2008-08-21	Chua et al.	
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	1	"Communication Concepts for Mobile Agent Systems," by Joachim Baumann et al.; Inst. Of Parallel and Distributed High-Performance Systems, Univ. of Stuttgart, Germany, pp. 123-135, 1997	☐

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Issue Classification	Application/Control No.	Applicant(s)/Patent under Reexamination	
	13/248,028	RALEIGH ET AL.	
	Examiner	Art Unit	
	ANDREW JOSEPH RUDY	3687	

ISSUE CLASSIFICATION

ORIGINAL						CROSS REFERENCE(S)							
CLASS				SUBCLASS	CLASS	SUBCLASS (ONE SUBCLASS PER BLOCK)							
709				203	709	224							
INTERNATIONAL CLASSIFICATION					455	406							
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XXXXXXXXXXXXXXXXXXXX (Assistant Examiner) (Date)	/Andrew Joseph Rudy/ 7/10/2014 (Primary Examiner) (Date)	**Total Claims Allowed: 47**
(Legal Instruments Examiner) (Date)		O.G. Print Claim(s): 1 / O.G. Print Fig.: 1

☐ **Claims renumbered in the same order as presented by applicant** ☐ CPA ☐ T.D. ☐ R.1.47

Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original
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	23	23	53		83		113		143		173		203
	24	24	54		84		114		144		174		204
	25	25	55		85		115		145		175		205
26	26		56		86		116		146		176		206
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28	28		58		88		118		148		178		208
29	29		59		89		119		149		179		209
30	30		60		90		120		150		180		210

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

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First Named Inventor	Gregory G. Raleigh
Art Unit	3687
Examiner Name	Andrew J RUDY
Attorney Docket Number	RALEP037 [26WV-160514]

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Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6185576	B1	2001-02-06	Mcintosh, Lowrie	
	2	7320029	B2	2008-01-15	Rinne et al.	
	3	7539132	B2	2009-05-26	Werner et al.	
	4	7805606	B2	2010-09-28	Birger et al.	
	5	8175574	B1	2012-05-08	Panda et al.	
	6	8180881	B2	2012-05-15	Seo et al.	
	7	8191124	B2	2012-05-29	Wynn et al.	
	8	8275415	B2	2012-09-25	Huslak, Nicholas S.	

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	9	8300575	B2	2012-10-30	Willars, Per	
	10	8315593	B2	2012-11-20	Gallant et al.	
	11	8347378	B2	2013-01-01	Merkin et al.	
	12	8375128	B2	2013-02-12	Tofighbakhsh et al.	
	13	8527410	B2	2013-09-03	Markki et al.	
	14	8539561	B2	2013-09-17	Gupta et al.	
	15	8554876	B2	2013-10-08	Winsor, Gerald W.	
	16	8589541	B2	2013-11-19	Raleigh et al.	
	17	8666395	B2	2014-03-04	Silver, Andrew	
	18	8391834	B2	2013-03-05	Raleigh, Gregory G.	

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	1	20110238545	A	2011-09-29	Fanaian, Nabil Ruh et al.	
	2	20040170191	A	2004-09-02	Guo et al.	
	3	20040203833	A	2004-10-14	Rathunde, Dale F. et al.	
	4	20050186948	A	2005-08-25	Gallagher et al.	
	5	20070147317	A	2007-06-28	Smith et al.	
	6	20080025230	A	2008-01-31	Patel et al.	
	7	20080056273	A	2008-03-06	Pelletier et al.	
	8	20080270212	A	2008-10-30	Blight et al.	
	9	20100030890	A	2010-02-04	Dutta et al.	
	10	20110110309	A	2011-05-12	Bennett, James D.	

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	1	1310401	CN	A	2001-08-29	Wang, Di Xing		☐
	2	2466831	EP	A1	2012-06-20	Openet Telecom Ltd. - Mcnamee et al.		☐
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	1	"End to End QoS Solution for Real-time Multimedia Application;" Computer Engineering and Applications, 2007, 43 (4): 155-159, by Tan Zu-guo, Wang Wen-juan; Information and Science School, Zhanjian Normal College, Zhan jiang, Guangdong 524048, China	☐
	2	"ASA/PIX: Allow Split Tunneling for VPN Clients on the ASA Configuration Example," Document ID 70917, January 10, 2008	☐

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Doc description: Information Disclosure Statement (IDS) Filed

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	2	7720464	B2	2010-05-18	Batta, Puneet	
	3	7797060	B2	2010-09-14	Grgic et al.	
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	7	8095124	B2	2012-01-10	Balia, Hinal K.	
	8	8229394	B2	2012-07-24	Karlberg, Johan	

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	9	8264965	B2	2012-09-11	Dolganow et al.	
	10	8442015	B2	2013-05-14	Behzad et al.	
	11	8495700	B2	2013-07-23	Shahbazi, Majid	
	12	8528068	B1	2013-09-03	Weglein et al.	
	13	8548427	B2	2013-10-01	Chow et al.	
	14	8566236	B2	2013-10-22	Busch, James David	
	15	8572117	B2	2013-10-29	Rappaport, Theodore S.	
	16	8589955	B2	2013-11-19	Roundtree et al.	
	17	8601125	B2	2013-12-03	Huang et al.	
	18	8626115	B2	2014-01-07	Raleigh et al.	
	19	8635164	B2	2014-01-21	Rosenhaft et al.	

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	20	8660853	B2	2014-02-25	Robb et al.	

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	2	20030188117	A	2003-10-02	Yoshino et al.	
	3	20040255145	A	2004-12-16	Chow, Jerry	
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	8	20080263348	A	2008-10-23	Zaltsman et al.	

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	9	20080313315	A	2008-12-18	Karaoguz et al.	
	10	20090282127	A	2009-11-12	Leblanc et al.	
	11	20100167696	A	2010-07-01	Smith, Christopher David et al.	
	12	20110019574	A	2011-01-27	Malomsoky et al.	

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Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	101123553A	CN		2007-09-11	Southeast University		☐
	2	1937511A	CN		2007-03-28	ZTE		☐

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	1		☐

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Examiner Signature	/Andrew Joseph Rudy/	Date Considered	06/04/2014

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Search Notes	Application/Control No.	Applicant(s)/Patent under Reexamination
	13/248,028	RALEIGH ET AL.
	Examiner	Art Unit
	ANDREW JOSEPH RUDY	3687

SEARCHED			
Class	Subclass	Date	Examiner
prior			
search	updated	7/10/2014	AJR

INTERFERENCE SEARCHED			
Class	Subclass	Date	Examiner
709	**203,224**	**7/10/2014**	**AJR**
455	406	7/10/2014	AJR

SEARCH NOTES (INCLUDING SEARCH STRATEGY)		
	DATE	EXMR
Continuity data reviewed.	7/10/2014	AJR
CPC search executed.	7/10/2014	AJR

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	4	7805606	B2	2010-09-28	Birger et al.	
	5	8175574	B1	2012-05-08	Panda et al.	
	6	8180881	B2	2012-05-15	Seo et al.	
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	11	8347378	B2	2013-01-01	Merkin et al.	
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	14	8539561	B2	2013-09-17	Gupta et al.	
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	16	8589541	B2	2013-11-19	Raleigh et al.	
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	2	20040170191	A	2004-09-02	Guo et al.	
	3	20040203833	A	2004-10-14	Rathunde, Dale F. et al.	
	4	20050186948	A	2005-08-25	Gallagher et al.	
	5	20070147317	A	2007-06-28	Smith et al.	
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	7	20080056273	A	2008-03-06	Pelletier et al.	
	8	20080270212	A	2008-10-30	Blight et al.	
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	10	20110110309	A	2011-05-12	Bennett, James D.	

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	1	1310401	CN	A	2001-08-29	Wang, Di Xing		☐
	2	2466831	EP	A1	2012-06-20	Openet Telecom Ltd. - Mcnamee et al.		☐
	3	2007133844	WO	A	2007-11-22	Camiant, Inc.		☐
	4	1999027723	WO	A1	1999-06-03	Telefonaktiebolaget LM Ericsson		☐

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	2	"ASA/PIX: Allow Split Tunneling for VPN Clients on the ASA Configuration Example," Document ID 70917, January 10, 2008	☐

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☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

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A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Krista S. Jacobsen/	Date (YYYY-MM-DD)	2014-05-22
Name/Print	Krista S. Jacobsen	Registration Number	59374

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5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

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7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt	
EFS ID:	19104114
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen
Filer Authorized By:	
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	22-MAY-2014
Filing Date:	28-SEP-2011
Time Stamp:	14:38:47
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	613413 f7c981d584761cb222c0790a5763dda0ae53852a	no	7

Warnings:
Information:

2	Foreign Reference	2043_EP2466831A1.pdf	1530373 fcc550ea4f7f61dc3b1fb7695c6b44459cb7cf30	no	63
Warnings:					
Information:					
3	Foreign Reference	2044_WO1999027723A1.pdf	904456 a688012e12d1ad3b8550a0c726a94bd72b28a6fa	no	36
Warnings:					
Information:					
4	Foreign Reference	2045_WO2007133844.pdf	1180849 f4c87541e0759ae271d1a7f67a656801997a5558	no	30
Warnings:					
Information:					
5	Foreign Reference	2046_CN1310401A.pdf	992440 a1b82929f3d1ce8d217485b34de268afea8f7863	no	13
Warnings:					
Information:					
6	Non Patent Literature	3037_EndtoEnd.pdf	1097643 c0f57a22ab875fecfc286cd70be1ebcae7fc806b	no	5
Warnings:					
Information:					
7	Non Patent Literature	3038_ASA.pdf	786693 5580855f6934ae1eab1a3251238ecc9c807ee7a9	no	24
Warnings:					
Information:					
		Total Files Size (in bytes):	7105867		

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99)**		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS						Remove
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6885997	B1	2005-04-26	Roberts, David T.	
	2	7720464	B2	2010-05-18	Batta, Puneet	
	3	7797060	B2	2010-09-14	Grgic et al.	
	4	7853255	B2	2010-12-14	Karaoguz et al.	
	5	7930327	B2	2011-04-19	Craft David et al.	
	6	8046449	B2	2011-10-25	Yoshiuchi, Hideya	
	7	8095124	B2	2012-01-10	Balia, Hinal K.	
	8	8229394	B2	2012-07-24	Karlberg, Johan	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	9	8264965	B2	2012-09-11	Dolganow et al.	
	10	8442015	B2	2013-05-14	Behzad et al.	
	11	8495700	B2	2013-07-23	Shahbazi, Majid	
	12	8528068	B1	2013-09-03	Weglein et al.	
	13	8548427	B2	2013-10-01	Chow et al.	
	14	8566236	B2	2013-10-22	Busch, James David	
	15	8572117	B2	2013-10-29	Rappaport, Theodore S.	
	16	8589955	B2	2013-11-19	Roundtree et al.	
	17	8601125	B2	2013-12-03	Huang et al.	
	18	8626115	B2	2014-01-07	Raleigh et al.	
	19	8635164	B2	2014-01-21	Rosenhaft et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	20	8660853	B2	2014-02-25	Robb et al.	

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U.S.PATENT APPLICATION PUBLICATIONS Remove

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20030188006	A	2003-10-02	Bard, Steven R.	
	2	20030188117	A	2003-10-02	Yoshino et al.	
	3	20040255145	A	2004-12-16	Chow, Jerry	
	4	20050055595	A	2005-03-10	Frazer et al.	
	5	20060160536	A	2006-07-20	Chou, Joey	
	6	20060168128	A	2006-07-27	Sistla et al.	
	7	20070259656	A	2007-11-08	Jeong, Jong Woo	
	8	20080263348	A	2008-10-23	Zaltsman et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	9	20080313315	A	2008-12-18	Karaoguz et al.	
	10	20090282127	A	2009-11-12	Leblanc et al.	
	11	20100167696	A	2010-07-01	Smith, Christopher David et al.	
	12	20110019574	A	2011-01-27	Malomsoky et al.	

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FOREIGN PATENT DOCUMENTS Remove

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	101123553A	CN		2007-09-11	Southeast University		☐
	2	1937511A	CN		2007-03-28	ZTE		☐

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NON-PATENT LITERATURE DOCUMENTS Remove

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

EXAMINER SIGNATURE			
Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Krista S. Jacobsen/	Date (YYYY-MM-DD)	2014-03-19
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these record s.

2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.

3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.

4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).

5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

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9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt	
EFS ID:	18528614
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen
Filer Authorized By:	
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	19-MAR-2014
Filing Date:	28-SEP-2011
Time Stamp:	18:21:06
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	613038 07f5bede2ed7b4b606d2cb59cc4796ec64389906	no	7

Warnings:
Information:

2	Foreign Reference	2041_CN101123553A.pdf	1975496 77fe4b0fe9cee8cb2bf4c46f64443dee1117f80e	no	16
Warnings:					
Information:					
3	Foreign Reference	2042_CN1937511A.pdf	3222683 57d4f0e05771df6cf8790dcaecf3a418734fec42	no	29
Warnings:					
Information:					
			Total Files Size (in bytes):	5811217	

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	5774532	A	1998-06-30	Gottlieb et al.	
If you wish to add additional U.S. Patent citation information please click the Add button.						
U.S.PATENT APPLICATION PUBLICATIONS						
Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20040225898	A	2004-11-11	Frost, D. et al.	
	2	20050079863	A	2005-04-14	Macaluso, Anthony G.	
	3	20060114832	A	2006-06-01	Hamilton et al.	
	4	20060156398	A	2006-07-13	Ross et al.	
	5	20060173959	A	2006-08-03	Mckelvie et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	6	20070033194	A	2007-02-08	Srinivas et al.	
	7	20080070550	A	2008-03-20	Hose, David Alan	
	8	20080201266	A	2008-08-21	Chua et al.	
	9	20100284327	A	2010-11-11	Miklos, Gyorgy	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1							☐

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NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	"Communication Concepts for Mobile Agent Systems," by Joachim Baumann et al.; Inst. Of Parallel and Distributed High-Performance Systems, Univ. of Stuttgart, Germany, pp. 123-135, 1997	☐

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

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OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2014-01-31
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Electronic Acknowledgement Receipt

EFS ID:	18088742
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	31-JAN-2014
Filing Date:	28-SEP-2011
Time Stamp:	19:59:07
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Non Patent Literature	3034_Baumann.pdf	2145168 7dcd8af1ff9cab4f61cecb7522d5e0d9c220729a	no	13

Warnings:	
Information:	

2	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	831959 1e2cddcd33a7647292a2fe37f4491d21e9332ffd	no	4
Warnings:					
Information:					
This is not an USPTO supplied IDS fillable form					
			Total Files Size (in bytes):	2977127	

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Missing Parts
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

REQUEST FOR A CORRECTED FILING RECEIPT

Madam:

Applicants respectfully request a corrected filing receipt for the above-captioned application. Submitted with this request are:

(1) The supplemental application data sheet (ADS) filed on September 25, 2013.

(2) A copy of the Decision on Petition mailed October 23, 2013, which states that a corrected filing receipt would be forthcoming.

(3) A copy of the Filing Receipt mailed July 24, 2013 with the requested changes noted thereon.

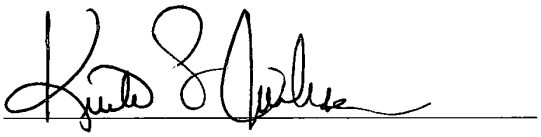
Although the Decision on Petition mailed October 23, 2013 indicated that a corrected filing receipt would be forthcoming, to date Applicants have not received a corrected filing receipt.

Applicants respectfully note that this request is not a request to add or correct a benefit claim. Applicants' Petition to Correct Priority Claim was already granted on October 23, 2013. Applicants are simply seeking a filing receipt that reflects the ADS that was filed on October 3, 2013.

CONCLUSION

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

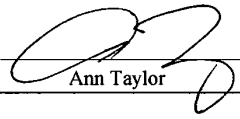
Respectfully submitted,

Date: January 15, 2014 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: Jan. 15, 2014 By: 
Ann Taylor

Supplemental Application Data Sheet	Attorney Docket No.	RALEP037
	Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS	

Applicant Information:

Applicant 1 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Gregory
Middle Name:	G.
Family Name:	Raleigh
Residence Information:	
City:	Woodside
State:	CA
Country of Residence:	USA
Citizenship Country:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Applicant 2 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Alireza
Middle Name:	
Family Name:	Raissinia
Residence Information:	
City:	Monte Sereno
State:	CA
Country of Residence:	USA
Citizenship Country:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Supplemental Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Applicant 3 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Jeffrey
Middle Name:	
Family Name:	Green
Residence Information:	
City:	Sunnyvale
State:	CA
Country of Residence:	USA
Citizenship Country:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Correspondence Information:

Correspondence Address:	Customer Number 107265
E-mail address:	patent@headwaterllc.com

Application Information:

Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
Attorney Docket Number:	RALEP037
Small Entity Status Claimed:	Yes

Supplemental Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Application Type:	Nonprovisional
Subject Matter:	Utility
Total Number of Drawing Sheets:	28
Suggested Drawing Figure for Publication:	___

Representative Information:

Customer Number: 107265

Domestic Benefit/National Stage Information:

This Application No. 13/248,028, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 **(PAT 8270310)**
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 **(PAT 8321526)**
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 **(PAT 8355337)**
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 **(PAT 8331901)**
and is a CIP of Application No. 12/380,756, filed 03/02/2009 **(PAT 8250207)**
and is a CIP of Application No. 12/380,770, filed 03/02/2009 **(ABN)**
~~**and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)**~~
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 **(PAT 8270952)**
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 **(PAT 8326958)**
and is a CIP of Application No. 12/380,781, filed 03/02/2009 **(PAT 8229812)**
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009

and is a CIP of Application No. 12/695,019, filed 01/27/2010 **(PAT 8275830)**
and is a CIP of Application No. 12/695,020, filed 01/27/2010 **(PAT 8406748)**
and is a CIP of Application No. 12/694,445, filed 01/27/2010 **(PAT 8391834)**
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 **(PAT 8402111)**
and is a CIP of Application No. 12/695,021, filed 01/27/2010 **(PAT 8346225)**
and is a CIP of Application No. 12/695,980, filed 01/28/2010 **(PAT 8340634)**
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and is a CIP of Application No. 13/239,321, filed 09/21/2011
and is a CIP of Application No. 13/247,998, filed 09/28/2011
and is a CIP of Application No. 13/248,025, filed 09/28/2011
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 12/380,759, filed 03/02/2009 **(PAT 8270310)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,779, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,758, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,778, filed 03/02/2009 **(PAT 8321526)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,768, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,767, filed 03/02/2009 **(PAT 8355337)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,780, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,755, filed 03/02/2009 **(PAT 8331901)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,756, filed 03/02/2009 **(PAT 8250207)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,770, filed 03/02/2009 **(ABN)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,772, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,782, filed 03/02/2009 **(PAT 8270952)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,783, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,757, filed 03/02/2009 **(PAT 8326958)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,781, filed 03/02/2009 **(PAT 8229812)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,774, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,773, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,769, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,777, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/695,019, filed 01/27/2010 **(PAT 8275830)**
is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/264,126, filed 11/24/2009

and said Application No. 12/695,020, filed 01/27/2010 **(PAT 8406748)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/275,208, filed 08/25/2009
and claims the benefit of Application No. 61/237,753, filed 08/28/2009

and said Application No. 12/694,445, filed 01/27/2010 **(PAT 8391834)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009

and said Application No. 12/694,451, filed 01/27/2010
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/694,455, filed 01/27/2010 **(PAT 8402111)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/264,120, filed 11/24/2009

and said Application No. 12/695,021, filed 01/27/2010 **(PAT 8346225)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/695,980, filed 01/28/2010 **(PAT 8340634)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009

and said Application No. 13/134,028, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009

and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and claims the benefit of Application No. 61/348,022, filed 05/25/2010
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010

and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/134,005, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
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and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
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Foreign Priority Information:

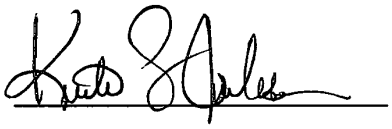
None.

Supplemental Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Assignee Information:

Assignee is:	The Assignee, which is an Organization
Organization Name:	Headwater Partners I LLC
Mailing Address Information for Applicant:	Headwater Partners I LLC 350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 U.S.A. (650) 517-2798
E-mail Address:	patent@headwaterllc.com

Signature:

Signature: 

Date: September 25, 2013

Printed/Typed Name: Krista S. Jacobsen

Registration Number: 59,374

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350 Marine Parkway, Suite 300
Redwood Shores CA 94065

MAILED

OCT 23 2013

OFFICE OF PETITIONS

In re Application of :
RALEIGH et al. :
Application No. 13/248,028 : DECISION ON PETITION
Filed: 09/28/2011 :
Attorney Docket No. RALEP037 [26WV-160514] :

This is a decision on the renewed petition under 37 CFR 1.78(a)(3) and 1.78(a)(6), filed September 25, 2013, to accept an unintentionally delayed claim under 35 U.S.C. 120 and 119(e) for the benefit of prior-filed nonprovisional and provisional applications as set forth in the accompanying Supplemental Application Data Sheet (ADS).

The petition is **GRANTED.**

A petition for acceptance of an unintentionally delayed claim under 37 CFR 1.78(a)(3) and 1.78(a)(6) is only applicable to those applications filed on or after November 29, 2000, and after the expiration of the period specified in 37 CFR 1.78(a)(2)(ii) and 1.78(a)(5)(ii). In addition, the petition under 37 CFR 1.78(a)(3) and 1.78(a)(6) must be accompanied by:

(1) The reference required by 35 U.S.C. 120 and 119(e) and 37 CFR 1.78(a)(2)(i) and 1.78(a)(5)(i) of the prior-filed application, unless previously submitted;

(2) The surcharge set forth in § 1.17(t); and,

(3) A statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2)(ii) and 1.78(a)(5)(ii) and the date the claim was filed was unintentional. The Director may require additional where there is a question whether the delay was unintentional.

The reference must be submitted during the pendency of the later-filed application as required by 37 CFR 1.78(a)(5)(ii). Further, the nonprovisional application claiming the benefit of the prior-filed provisional application must have been filed within twelve months of the filing date of the prior-filed provisional application.

All the above requirements having been satisfied, the late claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed applications is accepted as being unintentionally delayed.

The granting of the petition to accept the delayed benefit claim to the prior-filed applications under 37 CFR 1.78(a)(3) and 1.78(a)(6) should not be construed as meaning that this application is entitled to the benefit of the filing date of the prior-filed applications. In order for this application to be entitled to the benefit of the prior-filed applications, all other requirements under 35 U.S.C. 120 and 37 CFR 1.78(a)(1) and (a)(2) and under 35 U.S.C. 119(e) and 37 CFR 1.78(a)(4) and (a)(5) must be met. Accordingly, the examiner will, in due course, consider this benefit claim and determine whether the application is entitled to the benefit of the earlier filing date.

A corrected Filing Receipt, which includes the claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed applications, will be forthcoming under separate cover.

This application is being forwarded to Technology Center Art Unit 3687 for consideration by the Examiner of the claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed nonprovisional and provisional applications as set in the Supplemental ADS filed September 25, 2013.

Any questions concerning this matter may be directed to the undersigned at (571) 272-3211. All other inquiries concerning either the examination procedures or status of the application should be directed to the Technology Center.

/Christina Tartera Donnell/

Christina Tartera Donnell
Senior Petitions Attorney
Office of Petitions

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APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY.DOCKET.NO	TOT CLAIMS	IND CLAIMS
13/248,028	09/28/2011	3687	1750	RALEP037 [26WV-160514]	25	4

CONFIRMATION NO. 8510

107265
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

CORRECTED FILING RECEIPT

OC000000062695657

Date Mailed: 07/24/2013

Receipt is acknowledged of this non-provisional patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please submit a written request for a Filing Receipt Correction. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections**

Inventor(s)

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Applicant(s)

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

Power of Attorney: The patent practitioners associated with Customer Number 107265

Domestic Priority data as claimed by applicant

This application is a CIP of 12/380,759 03/02/2009 PAT 8270310
[and] ~~which~~ is a CIP of 12/380,779 03/02/2009
This application 13/248,028
is a CIP of 12/380,758 03/02/2009
and is a CIP of 12/380,778 03/02/2009 PAT 8321526
and is a CIP of 12/380,768 03/02/2009
and is a CIP of 12/380,767 03/02/2009 PAT 8355337
and is a CIP of 12/380,780 03/02/2009
and is a CIP of 12/380,755 03/02/2009 PAT 8331901
and is a CIP of 12/380,756 03/02/2009 PAT 8250207
and is a CIP of 12/380,770 03/02/2009 ABN
~~and is a CIP of 12/380,771 03/02/2009 PAT 8023425~~
and is a CIP of 12/380,772 03/02/2009
and is a CIP of 12/380,782 03/02/2009 PAT 8270952
and is a CIP of 12/380,783 03/02/2009

and is a CIP of 12/380,757 03/02/2009 PAT 8326958
and is a CIP of 12/380,781 03/02/2009 PAT 8229812
and is a CIP of 12/380,774 03/02/2009
and is a CIP of 12/380,773 03/02/2009
and is a CIP of 12/380,769 03/02/2009
and is a CIP of 12/380,777 03/02/2009
and is a CIP of 12/695,019 01/27/2010 PAT 8275830
and is a CIP of 12/695,020 01/27/2010 PAT 8406748
~~which is a CIP of 12/394,445 02/27/2009 PAT 8418148~~
This application 13/248,028
is a CIP of 12/694,451 01/27/2010
~~and is a CIP of 12/394,455 02/27/2009 PAT 8109801~~
and is a CIP of 12/695,021 01/27/2010 PAT 8346225
and is a CIP of 12/695,980 01/28/2010 PAT 8340634
and is a CIP of 13/134,028 05/25/2011
~~which is a CIP of 12/134,005 06/05/2008 PAT 7518809~~
This application 13/248,028
is a CIP of 13/237,827 09/20/2011
and is a CIP of 13/239,321 09/21/2011
and is a CIP of 13/247,998 09/28/2011
and is a CIP of 13/248,025 09/28/2011
and claims benefit of 61/387,243 09/28/2010
and claims benefit of 61/387,247 09/28/2010
and claims benefit of 61/389,547 10/04/2010
and claims benefit of 61/407,358 10/27/2010
and claims benefit of 61/418,507 12/01/2010
and claims benefit of 61/418,509 12/01/2010
and claims benefit of 61/420,727 12/07/2010
and claims benefit of 61/422,565 12/13/2010
and claims benefit of 61/422,572 12/13/2010
and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

ADD Remaining priority claim as listed on ADS

Foreign Applications for which priority is claimed (You may be eligible to benefit from the **Patent Prosecution Highway** program at the USPTO. Please see http://www.uspto.gov for more information.) - None.
Foreign application information must be provided in an Application Data Sheet in order to constitute a claim to foreign priority. See 37 CFR 1.55 and 1.76.

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The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 13/248,028**

Projected Publication Date: Not Applicable

Non-Publication Request: No

Early Publication Request: No
**** SMALL ENTITY ****

Title

ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

Preliminary Class

705

Statement under 37 CFR 1.55 or 1.78 for AIA (First Inventor to File) Transition Applications:

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Electronic Acknowledgement Receipt	
EFS ID:	17926625
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	15-JAN-2014
Filing Date:	28-SEP-2011
Time Stamp:	21:50:10
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Request for Corrected Filing Receipt	P037Request.pdf	2622833 fd822c9a89341e078bd88cfc913e3b4a95e908c3	no	27

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National Stage of an International Application under 35 U.S.C. 371
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New International Application Filed with the USPTO as a Receiving Office
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PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
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	8	7113780	B2	2006-09-26	Mckenna Daniel et al.	

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	10	7286834	B2	2007-10-23	Walter	
	11	7460837	B2	2008-12-02	Diener, Neil R.	
	12	7540408	B2	2009-06-02	Levine, Judah et al.	
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	19	7653394	B2	2010-01-26	McMillin, Brian K.	

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	28	7958029	B1	2011-06-07	Bobich et al.	
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	51	8483694	B2	2013-07-09	Lewis et al.	
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	Attorney Docket Number	RALEP037 [26WV-160514]

	53	8489720	B1	2013-07-16	Morford, Michael et al.	
	54	8509082	B2	2013-08-13	Heinz, John M. et al.	
	55	8516552	B2	2013-08-20	Raleigh	
	56	8522039	B2	2013-08-27	Hyndman et al.	
	57	8526329	B2	2013-09-03	Mahany, Ronald L. et al.	
	58	8526350	B2	2013-09-03	Xue, Qi et al.	
	59	8543265	B2	2013-09-24	Ekhaguere et al.	
	60	8544105	B2	2013-09-24	Mclean et al.	
	61	8548428	B2	2013-10-01	Raleigh, Gregory G.	
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	63	8571474	B2	2013-10-29	Chavez et al.	

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	64	8571993	B2	2013-10-29	Kocher et al.	
	65	8583499		2013-11-12	De Judicibus, Dario et al.	

If you wish to add additional U.S. Patent citation information please click the Add button.

U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20060174035	A	2006-08-03	Tufail, Mudassir	
	2	20070025301	A	2007-02-01	Petersson et al.	
	3	20070140145	A	2007-06-21	Kumar et al.	
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	5	20080120129	A	2008-05-22	Seubert et al.	
	6	20110264923	A	2011-10-27	Kocher et al.	
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FOREIGN PATENT DOCUMENTS								
Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	101341764A	CN		2009-01-07	Telefonaktiebolaget LM Ericsson		☐
	2	1802839A	CN		2006-07-12	Motorola Inc.		☐
	3	2004064306	WO		2004-07-29	Motorola Inc.		☐
	4	2007068288	WO		2007-06-21	Telefonaktiebolaget LM Ericsson		☐
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NON-PATENT LITERATURE DOCUMENTS			
Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	"The Construction of Intelligent Residential District in Use of Cable Television Network," Shandong Science, Vol. 13, No. 2, June 2000	☐
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
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	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

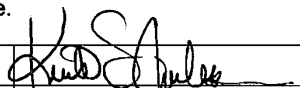
☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-11-25
Name/Print	Krista S. Jacobsen	Registration Number	59374

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6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt	
EFS ID:	17502218
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	26-NOV-2013
Filing Date:	28-SEP-2011
Time Stamp:	03:19:29
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	372067 e5185e9bef2a45ac97739dbfe7c0e709271f9bf9	no	10

Warnings:
Information:

This is not an USPTO supplied IDS fillable form					
2	Foreign Reference	2039_CN101341764A.pdf	1138895 2e2dbcd7a125a434c6548925e43e263bfbdc4a20	no	25
Warnings:					
Information:					
3	Foreign Reference	2039_WO2007068288A1.pdf	216996 5471cebc5a9ee9308c5123883f1aef1064b81f4f	no	32
Warnings:					
Information:					
4	Foreign Reference	2040_CN1802839A.pdf	891159 52b2d7b964ee757bb22239fc56aa4b0e6b82ac84	no	18
Warnings:					
Information:					
5	Foreign Reference	2040_WO2004064306A2.pdf	510026 4efd4e07b8efec25946c766ec966cd4a4accab55	no	22
Warnings:					
Information:					
6	Non Patent Literature	3033_ChineseLit.pdf	692944 27c80a849cc8dbc81b552f052687e58018a96512	no	2
Warnings:					
Information:					
			Total Files Size (in bytes):	3822087	

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores CA 94065

MAILED

OCT 23 2013

OFFICE OF PETITIONS

In re Application of :
RALEIGH et al. :
Application No. 13/248,028 : DECISION ON PETITION
Filed: 09/28/2011 :
Attorney Docket No. RALEP037 [26WV-160514] :

This is a decision on the renewed petition under 37 CFR 1.78(a)(3) and 1.78(a)(6), filed September 25, 2013, to accept an unintentionally delayed claim under 35 U.S.C. 120 and 119(e) for the benefit of prior-filed nonprovisional and provisional applications as set forth in the accompanying Supplemental Application Data Sheet (ADS).

The petition is **GRANTED.**

A petition for acceptance of an unintentionally delayed claim under 37 CFR 1.78(a)(3) and 1.78(a)(6) is only applicable to those applications filed on or after November 29, 2000, and after the expiration of the period specified in 37 CFR 1.78(a)(2)(ii) and 1.78(a)(5)(ii). In addition, the petition under 37 CFR 1.78(a)(3) and 1.78(a)(6) must be accompanied by:

(1) The reference required by 35 U.S.C. 120 and 119(e) and 37 CFR 1.78(a)(2)(i) and 1.78(a)(5)(i) of the prior-filed application, unless previously submitted;

(2) The surcharge set forth in § 1.17(t); and,

(3) A statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2)(ii) and 1.78(a)(5)(ii) and the date the claim was filed was unintentional. The Director may require additional where there is a question whether the delay was unintentional.

The reference must be submitted during the pendency of the later-filed application as required by 37 CFR 1.78(a)(5)(ii). Further, the nonprovisional application claiming the benefit of the prior-filed provisional application must have been filed within twelve months of the filing date of the prior-filed provisional application.

All the above requirements having been satisfied, the late claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed applications is accepted as being unintentionally delayed.

The granting of the petition to accept the delayed benefit claim to the prior-filed applications under 37 CFR 1.78(a)(3) and 1.78(a)(6) should not be construed as meaning that this application is entitled to the benefit of the filing date of the prior-filed applications. In order for this application to be entitled to the benefit of the prior-filed applications, all other requirements under 35 U.S.C. 120 and 37 CFR 1.78(a)(1) and (a)(2) and under 35 U.S.C. 119(e) and 37 CFR 1.78(a)(4) and (a)(5) must be met. Accordingly, the examiner will, in due course, consider this benefit claim and determine whether the application is entitled to the benefit of the earlier filing date.

A corrected Filing Receipt, which includes the claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed applications, will be forthcoming under separate cover.

This application is being forwarded to Technology Center Art Unit 3687 for consideration by the Examiner of the claim under 35 U.S.C. 120 and 119(e) for the benefit of the prior-filed nonprovisional and provisional applications as set in the Supplemental ADS filed September 25, 2013.

Any questions concerning this matter may be directed to the undersigned at (571) 272-3211. All other inquiries concerning either the examination procedures or status of the application should be directed to the Technology Center.

/Christina Tartera Donnell/

Christina Tartera Donnell
Senior Petitions Attorney
Office of Petitions

Doc code: RCEX
Doc description: Request for Continued Examination (RCE)

PTO/SB/30EFS (07-09)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

REQUEST FOR CONTINUED EXAMINATION(RCE)TRANSMITTAL
(Submitted Only via EFS-Web)

Application Number	13248028	Filing Date	2011-09-28	Docket Number (if applicable)	RALEP037 [26WV-160514]	Art Unit	3687
First Named Inventor	Gregory G. Raleigh			Examiner Name	Rudy, Andrew J.		

This is a Request for Continued Examination (RCE) under 37 CFR 1.114 of the above-identified application.
Request for Continued Examination (RCE) practice under 37 CFR 1.114 does not apply to any utility or plant application filed prior to June 8, 1995, or to any design application. The Instruction Sheet for this form is located at WWW.USPTO.GOV

SUBMISSION REQUIRED UNDER 37 CFR 1.114

Note: If the RCE is proper, any previously filed unentered amendments and amendments enclosed with the RCE will be entered in the order in which they were filed unless applicant instructs otherwise. If applicant does not wish to have any previously filed unentered amendment(s) entered, applicant must request non-entry of such amendment(s).

☐ Previously submitted. If a final Office action is outstanding, any amendments filed after the final Office action may be considered as a submission even if this box is not checked.

☐ Consider the arguments in the Appeal Brief or Reply Brief previously filed on _____

☐ Other _____

☒ Enclosed

☐ Amendment/Reply

☒ Information Disclosure Statement (IDS)

☐ Affidavit(s)/ Declaration(s)

☒ Other
Petition to Withdraw an Application from Issue After Payment of Issue Fee Under 37 CFR 1.313(c)

MISCELLANEOUS

☐ Suspension of action on the above-identified application is requested under 37 CFR 1.103(c) for a period of months _____
(Period of suspension shall not exceed 3 months; Fee under 37 CFR 1.17(i) required)

☐ Other _____

FEES

☒ **The RCE fee under 37 CFR 1.17(e) is required by 37 CFR 1.114 when the RCE is filed.**
The Director is hereby authorized to charge any underpayment of fees, or credit any overpayments, to Deposit Account No 505876

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT REQUIRED

☒ Patent Practitioner Signature

☐ Applicant Signature

PTO/SB/30EFS (07-09)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Signature of Registered U.S. Patent Practitioner			
Signature	/Krista S. Jacobsen/	Date (YYYY-MM-DD)	2013-10-09
Name	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.114. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these records.

2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.

3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.

4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).

5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Large Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
Submission- Information Disclosure Stmt	1806	1	180	180
		Total in USD ($)		**180**

Electronic Acknowledgement Receipt	
EFS ID:	17084045
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	09-OCT-2013
Filing Date:	28-SEP-2011
Time Stamp:	16:02:54
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$180
RAM confirmation Number	2985
Deposit Account	505876
Authorized User	

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)

1	Fee Worksheet (SB06)	fee-info.pdf	30479 525c9ad2727a5613ae2082b26654ef697238099b	no	2
Warnings:					
Information:					
			Total Files Size (in bytes):	30479	

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	3687
Examiner Name	Andrew J RUDY
Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS Remove

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8351898		2013-01-08	Raleigh, Gregory G.	
	2	7929959		2011-04-19	DeAtley, Dallas et al.	

If you wish to add additional U.S. Patent citation information please click the Add button. Add

U.S.PATENT APPLICATION PUBLICATIONS Remove

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20120155296		2012-06-21	Kashanian, Nematolah	
	2	20120330792		2012-12-27	Kashanian, Nematolah	
	3	20130030960		2013-01-31	Kashanian, Nematolah	
	4	20110195700		2011-08-11	Kukuchka, Robert et al.	

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	101115248A	CN		2008-01-30	Lenovo Beijing Ltd.		☐
	2	1538730A	CN		2004-10-20	Zhongxing Communication Co., Ltd.		☐

If you wish to add additional Foreign Patent Document citation information please click the Add button Add

NON-PATENT LITERATURE DOCUMENTS Remove

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	VerizonWireless.com news, "Verizon Wireless Adds to Portfolio of Cosumer-Friendly Tools With Introduction of Usage Controls, Usage Controls and Chaperone 2.0 Offer Parents Full Family Security Solution," August 18, 2008	☐

If you wish to add additional non-patent literature document citation information please click the Add button Add

EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Krista S. Jacobsen/	Date (YYYY-MM-DD)	2013-10-09
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Privacy Act Statement

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The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these record s.

2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.

3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.

4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).

5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

Decision Date : October 9, 2013

In re Application of :

Gregory Raleigh

DECISION ON PETITION
UNDER CFR 1.313(c)(2)

Application No : 13248028

Filed : 28-Sep-2011

Attorney Docket No : RALEP037 [26WV-160514]

This is an electronic decision on the petition under 37 CFR 1.313(c)(2), filed October 9, 2013 , to withdraw the above-identified application from issue after payment of the issue fee.

The petition is **GRANTED.**

The above-identified application is withdrawn from issue for consideration of a submission under 37 CFR 1.114 (request for continued examination). See 37 CFR 1.313(c)(2).

Petitioner is advised that the issue fee paid in this application cannot be refunded. If, however, this application is again allowed, petitioner may request that it be applied towards the issue fee required by the new Notice of Allowance.

Telephone inquiries concerning this decision should be directed to the Patent Electronic Business Center (EBC) at 866-217-9197.

This application file is being referred to Technology Center AU 3687 for processing of the request for continuing examination under 37 CFR 1.114 .

Office of Petitions

Electronic Acknowledgement Receipt	
EFS ID:	17083848
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	09-OCT-2013
Filing Date:	28-SEP-2011
Time Stamp:	15:58:05
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$670
RAM confirmation Number	2845
Deposit Account	505876
Authorized User	
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.16 (National application filing, search, and examination fees) Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees)	

Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees) Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees) Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Petition automatically granted by EFS	petition-request.pdf	31974 2426411c165170ea47d74a4553f6a5f9cf9531d5	no	2
Warnings:					
Information:					
2	Request for Continued Examination (RCE)	P037RCE.pdf	697943 573ecc09d73923d50ed0b1298a84578bc4401361	no	3
Warnings:					
Information:					
3	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	612468 4ff7f1f89aa3b8106dc31aa11726b053dc225029	no	4
Warnings:					
Information:					
4	Foreign Reference	2037_CN1538730A.pdf	550169 2e3e24baa9d5890cdf219fc4a3d0303062aeda8c	no	11
Warnings:					
Information:					
5	Foreign Reference	2038_CN101115248B.pdf	798834 75acfe730044fed57cd917c2eae4f33b5e7d5028	no	15
Warnings:					
Information:					
6	Non Patent Literature	3032_Verizon.pdf	80548 984c09646690e8def9b16a30b9eef2c953a6263d	no	2
Warnings:					
Information:					
7	Fee Worksheet (SB06)	fee-info.pdf	32249 818bfa0d56da8414179d509c376308784e86b005	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	2804185		

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: PET.AUTO Document Description: Petition automatically granted by EFS-Web	PTO/SB/140 U.S. Patent and Trademark Office Department of Commerce

Electronic Petition Request	**PETITION TO WITHDRAW AN APPLICATION FROM ISSUE AFTER PAYMENT OF THE ISSUE FEE UNDER 37 CFR 1.313(c)**
Application Number	13248028
Filing Date	28-Sep-2011
First Named Inventor	Gregory Raleigh
Art Unit	3687
Examiner Name	ANDREW RUDY
Attorney Docket Number	RALEP037 [26WV-160514]
Title	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

An application may be withdrawn from issue for further action upon petition by the applicant. To request that the Office withdraw an application from issue, applicant must file a petition under this section including the fee set forth in § 1.17(h) and a showing of good and sufficient reasons why withdrawal of the application from issue is necessary.

APPLICANT HEREBY PETITIONS TO WITHDRAW THIS APPLICATION FROM ISSUE UNDER 37 CFR 1.313(c).

A grantable petition requires the following items:
(1) Petition fee; and
(2) One of the following reasons:
(a) Unpatentability of one or more claims, which must be accompanied by an unequivocal statement that one or more claims are unpatentable, an amendment to such claim or claims, and an explanation as to how the amendment causes such claim or claims to be patentable;
(b) Consideration of a request for continued examination in compliance with § 1.114 (for a utility or plant application only); or
(c) Express abandonment of the application. Such express abandonment may be in favor of a continuing application, but not a CPA under 37 CFR 1.53(d).

Petition Fee

☐ Applicant claims SMALL ENTITY status. See 37 CFR 1.27.

☐ Applicant is no longer claiming SMALL ENTITY status. See 37 CFR 1.27(g)(2).

☒ Applicant(s) status remains as SMALL ENTITY.

☐ Applicant(s) status remains as other than SMALL ENTITY

Reason for withdrawal from issue

◯ One or more claims are unpatentable ◉ Consideration of a request for continued examination (RCE) (List of Required Documents and Fees) ◯ Applicant hereby expressly abandons the instant application (any attorney/agent signing for this reason must have power of attorney pursuant to 37 CFR 1.32(b)).
RCE request,submission, and fee. ☐ I certify, in accordance with 37 CFR 1.4(d)(4) that : The RCE request ,submission, and fee have already been filed in the above-identified application on ☒ Are attached.
THIS PORTION MUST BE COMPLETED BY THE SIGNATORY OR SIGNATORIES I certify, in accordance with 37 CFR 1.4(d)(4) that I am: ◉ An attorney or agent registered to practice before the Patent and Trademark Office who has been given power of attorney in this application. ◯ An attorney or agent registered to practice before the Patent and Trademark Office, acting in a representative capacity. ◯ A sole inventor ◯ A joint inventor; I certify that I am authorized to sign this submission on behalf of all of the inventors ◯ A joint inventor; all of whom are signing this e-petition ◯ The assignee of record of the entire interest that has properly made itself of record pursuant to 37 CFR 3.71

Signature	/Krista S. Jacobsen/
Name	Krista S. Jacobsen
Registration Number	59374

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 09/27/2013

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	

ART UNIT	PAPER NUMBER
3687	

NOTIFICATION DATE	DELIVERY MODE
09/27/2013	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patent@headwaterllc.com

UNITED STATES DEPARTMENT OF COMMERCE
U.S. Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450

APPLICATION NO./ CONTROL NO.	FILING DATE	FIRST NAMED INVENTOR / PATENT IN REEXAMINATION	ATTORNEY DOCKET NO.
13/248,028	28 September, 2011	RALEIGH ET AL.	RALEP037 [26WV-160514]

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
ANDREW JOSEPH RUDY	
ART UNIT	PAPER
3687	20130924

DATE MAILED:

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner for Patents

Applicant's Information Disclosure Statement (IDS) submitted September 11, 2013 has been reviewed. Note the attached IDS.

/ANDREW JOSEPH RUDY/
Primary Examiner
Art Unit: 3687

PTO-90C (Rev.04-03)

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	3687
Examiner Name	Andrew J RUDY
Attorney Docket Number	RALEP037 [26WV-160514]

U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
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ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

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If you wish to add additional U.S. Patent citation information please click the Add button.

U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20010048738	A	2001-12-06	Baniak, Paul G. et al.	

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	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

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	22	20090157792		2009-06-18	Fiatal, Trevor	
	23	20100080202		2010-04-01	Hanson, Mark	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	24	20100131584		2010-05-27	Johnson, William J.	
	25	20100241544		2010-09-23	Benson, Dan et al.	
	26	20110013569	A	2011-01-20	Scherzer, Shimon et al.	
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	34	20120238287	A	2012-09-20	Scherzer, Shimon	

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

	35	20130117140		2013-05-09	Kashanian, Nematolah	
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	37	20130144789		2013-06-06	Aaltonen, Janne et al.	
	38	20130058274	A	2013-03-07	Scherzer, Shimon et al.	
	39	20130065555	A	2013-03-14	Baker, Matthew Donald et al.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	1998058505	WO		1998-12-23	Sonera Oy		☐
	2	2005008995	WO		2005-01-27	Starhub Ltd.		☐
	3	2007097786	WO	A	2007-08-30	Sony Ericsson Mobile Communications AB		☐

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NON-PATENT LITERATURE DOCUMENTS

EFS Web 2.1.17

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	3687
	Examiner Name	Andrew J RUDY
	Attorney Docket Number	RALEP037 [26WV-160514]

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	Accuris Networks, "The Business Value of Mobile Data Offload – a White Paper", 2010	☐
	2	ANTON, B. et al., "Best Current Practices for Wireless Internet Service Provider (WISP) Roaming"; Release Date February 2003, Version 1.0; Wi-Fi Alliance – Wireless ISP Roaming (WISPr)	☐
	3	Ruckus Wireless – White Paper; "Smarter Wi-Fi for Mobile Operator Infrastructures" 2010	☐
	4	THURSTON, Richard, "WISPr 2.0 Boosts Roaming Between 3G and Wi-Fi"; June 23, 2010; Web page from zdnet.com; Zdnet.com/wispr-2-0-boosts-roaming-between-3g-and-wi-fi-3040089325/	☐
	5	Wireless Broadband Alliance, "WISPr 2.0, 08 April, 2010"; Doc. Ref. No.: WBA/RM/WISPr, Version 01.00	☐

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	09/24/2013

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

EFS Web 2.1.17

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Petition
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

RENEWED PETITION UNDER 37 C.F.R. §§ 1.78(a)(3) AND (a)(6) TO ACCEPT AN UNINTENTIONALLY DELAYED PRIORITY CLAIM UNDER 35 U.S.C. §§ 120 AND 119(e)

Madam:

In the Decision Dismissing Petition mailed on September 19, 2013 (the "Decision"), the Petitions Officer dismissed the petition under 37 C.F.R. § 1.78(a)(3) to accept an unintentionally delayed claim under 35 U.S.C. § 120 (the "Petition"). The Decision stated that the application data sheet (ADS) Applicants filed to correct the domestic benefit information was not proper because it was not entitled "Supplemental Application Data Sheet" and did not identify the information that is being changed. The Decision also stated that the amendment to the specification Applicants filed was improper because it did not provide the appropriate markings to show all changes relative to the previous version of the paragraphs.

Applicants respectfully submit this Renewed Petition Under 37 C.F.R. §§ 1.78(a)(3) and (a)(6) to Accept an Unintentionally Delayed Priority Claim Under 35 U.S.C. §§ 120 and 119(e) (the "Renewed Petition").

The instant application is a continuation-in-part of several related co-pending applications. Applicants only recently noticed that the priority chains for some of the

applications of which the instant application is a continuation-in-part were not set forth completely in the priority claim when the instant application was filed, nor were they set forth completely in the priority claim filed in a preliminary amendment on December 14, 2011. In particular, the following information was not set forth:

- Application No. 12/380,769 claims the benefit of Provisional Application Nos. 61/206,354, 61/206,944, 61/207,393, and 61/207,739.
- Application No. 12/695,019 is a continuation-in-part (CIP) of Application Nos. 12/380,771 and 12/380,778.
- Application No. 12/695,020 is a CIP of Application No. 12/380,780.
- Application No. 12/694,445 is a CIP of Application No. 12/380,780.
- Application No. 12/694,451 is a CIP of Application No. 12/380,780.
- Application No. 12/694,455 is a CIP of Application No. 12/380,780.
- Application No. 12/695,021 is a CIP of Application No. 12/380,780.
- Application No. 12/695,980 is a CIP of Application Nos. 12/380,780, 12/695,019, and 12/695,021.
- Application No. 13/134,028 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,771, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, and 13/134,005, and claims the benefit of Provisional Application Nos. 61/381,159, 61/381,162, 61/384,456, 61/385,020, 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.
- Application No. 13/134,005 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756,

12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,771, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, and 12/695,980, and claims the benefit of Provisional Application Nos. 61/381,159, 61/381,162, 61/384,456, 61/385,020, 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

- Application No. 13/229,580 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,771, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, 13/134,005, and 13/134,028, and claims the benefit of Provisional Application Nos. 61/384,456, 61/385,020, 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

- Application No. 13/237,827 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, 13/134,005, 13/134,028, and 13/229,580, and claims the benefit of Provisional Application Nos. 61/385,020, 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

- Application No. 13/239,321 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, 13/134,005, 13/134,028, 13/229,580, and 13/237,827, and claims the benefit of Provisional Application Nos. 61/387,243, 61/387,247, 61/389,547,

61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

- Application No. 13/247,998 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, 13/134,005, 13/134,028, 13/229,580, 13/237,827, 13/239,321, 13,248,028, and 13/248,025, and claims the benefit of Provisional Application Nos. 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

- Application No. 13/248,025 is a CIP of Application Nos. 12/380,759, 12/380,779, 12/380,758, 12/380,778, 12/380,768, 12/380,767, 12/380,780, 12/380,755, 12/380,756, 12/380,770, 12/380,772, 12/380,782, 12/380,783, 12/380,757, 12/380,781, 12/380,774, 12/380,773, 12/380,769, 12/380,777, 12/695,019, 12/695,020, 12/694,445, 12/694,451, 12/694,455, 12/695,021, 12/695,980, 13/134,005, 13/134,028, 13/229,580, 13/237,827, 13/239,321, 13,248,028, and 13/247,998, and claims the benefit of Provisional Application Nos. 61/387,243, 61/387,247, 61/389,547, 61/407,358, 61/418,507, 61/418,509, 61/420,727, 61/422,565, 61/422,572, 61/422,574, 61/435,564, and 61/472,606.

Applicants note that each of the applications that would have been included in the priority chains, had the priority chains been set forth completely, were all referenced at least once elsewhere in the priority claim submitted in the preliminary amendment on December 14, 2011. Accordingly, no new matter is being added with the submission of this Renewed Petition. Nevertheless, out of an abundance of caution, Applicants are filing this Renewed Petition to provide the complete priority chains for all of the applications referenced in the priority claim. The Renewed Petition also deletes, from the listing of applications of which the instant application is a continuation-in-part, the reference to U.S. Application No. 12/380,771, which issued as U.S. Patent No. 8,023,425 before the filing date of the instant application.

The entire delay between the date the claim was due and the date the claim is being filed with this Renewed Petition was unintentional. Immediately after noticing that complete priority

chains had not been set forth for some of the referenced applications in the instant application, and that the priority claims in several related applications likewise did not provide complete priority chains for all referenced applications, Applicants began preparing a set of petitions to provide complete priority chains for all referenced applications.

In addition to the statement above that the entire delay between the date the claim was due and the date the claim is being filed with this Renewed Petition was unintentional, as required by 37 C.F.R. §§ 1.78(a)(3) and (a)(6), this Renewed Petition is accompanied by a supplemental application data sheet (ADS) containing the reference required by 35 U.S.C. §§ 120 and 119(e) and 37 C.F.R. §§ 1.78(a)(2) and (a)(4), showing all changes relative to the priority claim submitted in the preliminary amendment filed on December 14, 2011. Applicants previously paid the fee set forth in 37 C.F.R. § 1.17(t) when Applicants filed the Petition.

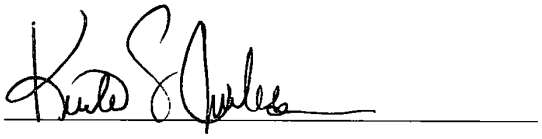
Pursuant to 37 C.F.R. § 1.312, Applicants previously submitted an Amendment After Notice of Allowance to amend the priority claim recitation in the specification so that it would reflect the information provided in the ADS being submitted with the Petition. As noted above, that Amendment After Notice of Allowance was unacceptable because it did not provide the appropriate markings to show all of the changes relative to the previous version of the paragraphs. Applicants have since paid the issue fee for the instant application, and therefore Applicants are not submitting a supplemental Amendment After Notice of Allowance. Applicants would be happy to provide amendments to the specification that reflect the priority claim in the supplemental ADS for inclusion in the patent if the Office determines that it is important or desirable for the first sentences of the specification to be consistent with the supplemental ADS.

CONCLUSION

Applicants respectfully request prompt grant of this Renewed Petition.

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

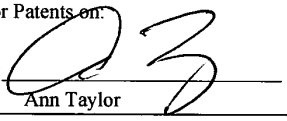
Respectfully submitted,

Date: September 25, 2013 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
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350 Marine Parkway, Suite 300
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CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: Sep. 25, 2013 By: 
Ann Taylor

Electronic Acknowledgement Receipt	
EFS ID:	16959573
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	25-SEP-2013
Filing Date:	28-SEP-2011
Time Stamp:	23:01:26
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Petition for review by the Office of Petitions.	P037RenewPetition.pdf	211707 83c84a1636bc02edcd293ffc9b91dd3bb9d36516	no	6
Warnings:					
Information:					

2	Application Data Sheet	P036SplADS.pdf	245575 f8f8c0239e3163fff8d602a149a978ca4d71d fee	no	15

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Supplemental Application Data Sheet	Attorney Docket No.	RALEP037
	Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS	

Applicant Information:

Applicant 1 -

Applicant Authority:	**Inventor**
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State:	CA
Country of Residence:	USA
Citizenship Country:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Applicant 2 -

Applicant Authority:	**Inventor**
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Middle Name:	
Family Name:	Raissinia
Residence Information:	
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State:	CA
Country of Residence:	USA
Citizenship Country:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Supplemental Application Data Sheet	Attorney Docket No.	RALEP037
	Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS	

Applicant 3 -

Applicant Authority:	**Inventor**
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Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Correspondence Information:

Correspondence Address:	Customer Number 107265
E-mail address:	patent@headwaterllc.com

Application Information:

Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
Attorney Docket Number:	RALEP037
Small Entity Status Claimed:	Yes

Supplemental Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Application Type:	Nonprovisional
Subject Matter:	Utility
Total Number of Drawing Sheets:	28
Suggested Drawing Figure for Publication:	___

Representative Information:

Customer Number: 107265

Domestic Benefit/National Stage Information:

This Application No. 13/248,028, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 **(PAT 8270310)**
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 **(PAT 8321526)**
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 **(PAT 8355337)**
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 **(PAT 8331901)**
and is a CIP of Application No. 12/380,756, filed 03/02/2009 **(PAT 8250207)**
and is a CIP of Application No. 12/380,770, filed 03/02/2009 **(ABN)**
~~**and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)**~~
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 **(PAT 8270952)**
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 **(PAT 8326958)**
and is a CIP of Application No. 12/380,781, filed 03/02/2009 **(PAT 8229812)**
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009

and is a CIP of Application No. 12/695,019, filed 01/27/2010 **(PAT 8275830)**
and is a CIP of Application No. 12/695,020, filed 01/27/2010 **(PAT 8406748)**
and is a CIP of Application No. 12/694,445, filed 01/27/2010 **(PAT 8391834)**
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 **(PAT 8402111)**
and is a CIP of Application No. 12/695,021, filed 01/27/2010 **(PAT 8346225)**
and is a CIP of Application No. 12/695,980, filed 01/28/2010 **(PAT 8340634)**
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and is a CIP of Application No. 13/239,321, filed 09/21/2011
and is a CIP of Application No. 13/247,998, filed 09/28/2011
and is a CIP of Application No. 13/248,025, filed 09/28/2011
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 12/380,759, filed 03/02/2009 **(PAT 8270310)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,779, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,758, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,778, filed 03/02/2009 **(PAT 8321526)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,768, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,767, filed 03/02/2009 **(PAT 8355337)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,780, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,755, filed 03/02/2009 **(PAT 8331901)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,756, filed 03/02/2009 **(PAT 8250207)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,770, filed 03/02/2009 **(ABN)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,772, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,782, filed 03/02/2009 **(PAT 8270952)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,783, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,757, filed 03/02/2009 **(PAT 8326958)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,781, filed 03/02/2009 **(PAT 8229812)**
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,774, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,773, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,769, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,777, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009

and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/695,019, filed 01/27/2010 **(PAT 8275830)**
is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/264,126, filed 11/24/2009

and said Application No. 12/695,020, filed 01/27/2010 **(PAT 8406748)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/275,208, filed 08/25/2009
and claims the benefit of Application No. 61/237,753, filed 08/28/2009

and said Application No. 12/694,445, filed 01/27/2010 **(PAT 8391834)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009

and said Application No. 12/694,451, filed 01/27/2010
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/694,455, filed 01/27/2010 **(PAT 8402111)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/264,120, filed 11/24/2009

and said Application No. 12/695,021, filed 01/27/2010 **(PAT 8346225)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/695,980, filed 01/28/2010 **(PAT 8340634)**
is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009

and said Application No. 13/134,028, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009

and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and claims the benefit of Application No. 61/348,022, filed 05/25/2010
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010

and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/134,005, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and claims the benefit of Application No. 61/348,022, filed 05/25/2010
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010

and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/229,580, filed 09/09/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009

and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/237,827, filed 09/20/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)

and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/239,321, filed 09/21/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
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and is a CIP of Application No. 12/380,772, filed 03/02/2009
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and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
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and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010

and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/247,998, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
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and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)

and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
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and is a CIP of Application No. 13/248,028, filed 09/28/2011
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and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/248,025, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
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and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
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and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

Foreign Priority Information:

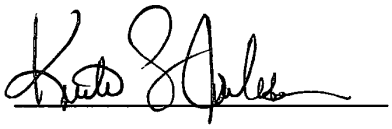
None.

Supplemental Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Assignee Information:

Assignee is:	The Assignee, which is an Organization
Organization Name:	Headwater Partners I LLC
Mailing Address Information for Applicant:	Headwater Partners I LLC 350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 U.S.A. (650) 517-2798
E-mail Address:	patent@headwaterllc.com

Signature:

Signature: 

Date: September 25, 2013

Printed/Typed Name: Krista S. Jacobsen

Registration Number: 59,374

Electronic Acknowledgement Receipt

EFS ID:	16959575
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	25-SEP-2013
Filing Date:	28-SEP-2011
Time Stamp:	23:02:37
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Application Data Sheet	P037SplADS.pdf	318670 3ca4721623281ca7fa8dad793bb50734894baa2a	no	19

Warnings:	
Information:	

This is not an USPTO supplied ADS fillable form	
Total Files Size (in bytes):	318670

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

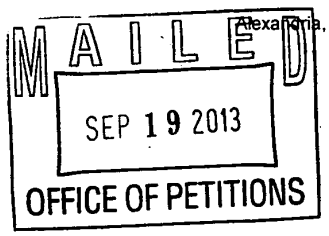
New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov



Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores CA 94065

In re Application of	:	
RALEIGH et al.	:	
Application No. 13/248,028	:	DECISION DISMISSING PETITION
Filed: 09/28/2011	:	
Attorney Docket No. RALEP037 [26WV-160514]	:	

This is a decision on the petition under 37 CFR 1.78(a)(3) filed August 30, 2013, to accept an unintentionally delayed claim under 35 U.S.C. 120 for the benefit of prior-filed nonprovisional applications as set forth in the accompanying Application Data Sheet (ADS) and amendment to the specification.

The petition is **DISMISSED**.

A petition under 37 CFR 1.78(a)(3) to accept an unintentionally delayed claim under 35 U.S.C. 120 for the benefit of a prior-filed application must be accompanied by:

(1) The reference required by 35 U.S.C. 120 and 37 CFR 1.78(a)(2) of the prior-filed application, unless previously submitted;

(2) The surcharge set forth in § 1.17(t); and

(3) A statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2)(ii) and the date the claim was filed was unintentional. The Director may require additional information where there is a question whether the delay was unintentional.

The petition does not comply with item (1).

Applicants filed an ADS with the present petition to correct the domestic benefit information. However, the ADS is unacceptable as drafted, and therefore, is not considered a proper reference under 37 CFR 1.78(a)(2)(i). Specifically, applicants failed to comply with the requirements set forth in 37 CFR 1.76(c)(2). The Office reminds applicants that if no ADS was originally filed, but applicants want to submit an ADS to correct or update the original application data, the ADS, even though it is the first-filed ADS, must be titled "Supplemental Application Data Sheet." See MPEP 601.05. Furthermore, 37 CFR 1.76(c)(2) states that a Supplemental Application Data Sheet "[m]ust be titled "Supplemental Application Data Sheet," include all of the section headings listed in [§ 1.76(b)], include all appropriate data for each section heading, and must identify the information that is being changed, preferably with underlining for insertions, and strike-through or brackets for text removed."

In this instance, applicants failed to use the appropriate markings to show the changes in the domestic benefit information and did not title the ADS a "Supplemental Application Data Sheet." Accordingly, the ADS filed on August 30, 2013, does not comply with 37 CFR 1.76(c)(2) and does not constitute a specific reference required by 37 CFR 1.78(a)(2).

Additionally, applicants submitted an amendment to the specification by replacing paragraphs to reflect the correct benefit claim to the prior-filed applications. However, the amendment to the specification is unacceptable as drafted, and therefore, is not considered a proper reference under 37 CFR 1.78(a)(2)(i).

37 CFR 1.121(b) states:

> Amendments to the specification, other than the claims, computer listings (§ 1.96) and sequence listings (§ 1.825), must be made by adding, deleting or replacing a paragraph, by replacing a section, or by a substitute specification, in the manner specified in this section.
>
> (1) *Amendment to delete, replace, or add a paragraph.* Amendments to the specification, including amendment to a section heading or the title of the invention which are considered for amendment purposes to be an amendment of a paragraph, must be made by submitting:
>
> (i) An instruction, which unambiguously identifies the location, to delete one or more paragraphs of the specification, replace a paragraph with one or more replacement paragraphs, or add one or more paragraphs;
>
> (ii) The full text of any replacement paragraph with markings to show all the changes relative to the previous version of the paragraph. The text of any added subject matter must be shown by underlining the added text. The text of

any deleted matter must be shown by strike-through except that double brackets placed before and after the deleted characters may be used to show

deletion of five or fewer consecutive characters. The text of any deleted subject matter must be shown by being placed within double brackets if strikethrough cannot be easily perceived;

(iii) The full text of any added paragraphs without any underlining; and

(iv) The text of a paragraph to be deleted must not be presented with strike-through or placed within double brackets. The instruction to delete may identify a paragraph by its paragraph number or include a few words from the beginning, and end, of the paragraph, if needed for paragraph identification purposes.

In this instance, applicants did not provide the appropriate markings to show all the changes relative to the previous version of the paragraphs. Accordingly, the amendment to the specification filed on August 30, 2013, does not comply with 37 CFR 1.121(b)(1) and does not constitute a specific reference required by 37 CFR 1.78(a)(2).

With any renewed petition under 37 CFR 1.78(a), applicants must submit a specific reference required by 37 CFR 1.78(a)(2) or (a)(5) in a Supplemental Application Data Sheet in compliance with 37 CFR 1.76(c)(2) and/or in an amendment to the first sentence(s) of the specification following the title in compliance with 37 CFR 1.121(b).

Further correspondence with respect to this matter should be addressed as follows:

By mail:	Mail Stop PETITIONS Commissioner for Patents Post Office Box 1450 Alexandria, VA 22313-1450
By hand:	Customer Service Window Mail Stop Petitions Randolph Building 401 Dulany Street Alexandria, VA 22314
By fax:	(571) 273-8300 ATTN: Office of Petitions

Registered users may also submit correspondence electronically via EFS-Web.

This application is being forwarded to the Office of Data Management.

Application No. 13/248,028

Any questions concerning this matter may be directed to the undersigned at (571) 272-3211.

/Christina Tartera Donnell/

Christina Tartera Donnell
Senior Petitions Attorney
Office of Petitions

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

107265 7590 06/14/2013
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission
I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

Ann Taylor	(Depositor's name)
	(Signature)
September 12, 2013	(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$890	$300	$0	$1190	09/16/2013

EXAMINER	ART UNIT	CLASS-SUBCLASS
RUDY, ANDREW J	3687	705-032000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).
- ☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
- ☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list
(1) the names of up to 3 registered patent attorneys or agents OR, alternatively,
(2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

1 Krista S. Jacobsen
2
3

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE: Headwater Partners I LLC

(B) RESIDENCE: (CITY and STATE OR COUNTRY): Redwood Shores, CA

Please check the appropriate assignee category or categories (will not be printed on the patent): ☐ Individual ☒ Corporation or other private group entity ☐ Government

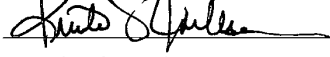
4a. The following fee(s) are submitted:
- ☒ Issue Fee
- ☒ Publication Fee (No small entity discount permitted)
- ☐ Advance Order - # of Copies _____

4b. Payment of Fee(s): **(Please first reapply any previously paid issue fee shown above)**
- ☐ A check is enclosed.
- ☐ Payment by credit card. Form PTO-2038 is attached.
- ☒ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment, to Deposit Account Number 505876 (enclose an extra copy of this form).

5. **Change in Entity Status** (from status indicated above)

☐ Applicant certifying micro entity status. See 37 CFR 1.29	NOTE: Absent a valid certification of Micro Entity Status (see form PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.
☐ Applicant asserting small entity status. See 37 CFR 1.27	NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.
☐ Applicant changing to regular undiscounted fee status.	NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: The Issue Fee and Publication Fee (if required) will not be accepted from anyone other than the applicant; a registered attorney or agent; or the assignee or other party in interest as shown by the records of the United States Patent and Trademark Office.

Authorized Signature  Date September 12, 2013

Typed or printed name Krista S. Jacobsen Registration No. 59374

This collection of information is required by 37 CFR 1.311. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, Virginia 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

Electronic Patent Application Fee Transmittal

Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]

Filed as Small Entity

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Utility Appl Issue Fee	2501	1	890	890
Publ. Fee- Early, Voluntary, or Normal	1504	1	300	300

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Extension-of-Time:				
Miscellaneous:				
			Total in USD ($)	**1190**

Electronic Acknowledgement Receipt	
EFS ID:	16841383
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
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Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	12-SEP-2013
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Application Type:	Utility under 35 USC 111(a)

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1	Issue Fee Payment (PTO-85B)	P037IssueFeeTrans.pdf	505425 5f9985a755f22f54b1b890f2320d95bbb3f1eff3	no	2
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2	Fee Worksheet (SB06)	fee-info.pdf	31999 2c5640710edcf6b10316f3a6eb39986cb46ba08a	no	2
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National Stage of an International Application under 35 U.S.C. 371
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	3687
Examiner Name	Andrew J RUDY
Attorney Docket Number	RALEP037 [26WV-160514]

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	Attorney Docket Number	RALEP037 [26WV-160514]

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Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
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	Attorney Docket Number	RALEP037 [26WV-160514]

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Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]¡	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	1998058505	WO		1998-12-23	Sonera Oy		☐
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NON-PATENT LITERATURE DOCUMENTS

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Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	Accuris Networks, "The Business Value of Mobile Data Offload – a White Paper", 2010	☐
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EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

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	Attorney Docket Number	RALEP037 [26WV-160514]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☒ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

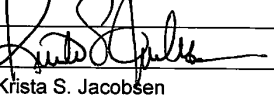
☐ See attached certification statement.

☒ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-09-11
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Raleigh et al.	Rudy, Andrew J.
Serial No. 13/248,028	Art Unit: 3687
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

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SUBMISSION OF INFORMATION DISCLOSURE STATEMENT AFTER RECEIPT OF NOTICE OF ALLOWANCE BUT PRIOR TO PAYMENT OF ISSUE FEE

Madam:

In accordance with the duty of disclosure under 37 CFR §1.56 and pursuant to 37 CFR §§ 1.97-1.98, Applicant hereby submits the references listed on the enclosed Form PTO-SB/08A.

The present Information Disclosure Statement is being filed after Applicant received the Notice of Allowance in the above-captioned application, but before Applicant has paid the Issue Fee. Accordingly, pursuant to 37 C.F.R. § 1.97(d), Applicant is submitting both the fee set forth in 37 C.F.R. § 1.17(p) and the certification statement set forth in 37 C.F.R. § 1.97(e).

Applicant respectfully requests consideration of the listed references.

CONCLUSION

Applicant respectfully requests that the Examiner consider the references listed in the IDS submitted herewith. In accordance with 37 C.F.R. § 1.97(d)-(e), the IDS is being filed prior to payment of the issue fee, with both the certification statement and fee specified in 37 C.F.R. § 1.97(d)-(e).

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: September 11, 2013

By: _____

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: September 11, 2013 By: _____
Ann Taylor

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Large Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
Submission- Information Disclosure Stmt	1806	1	180	180
		Total in USD ($)		**180**

Electronic Acknowledgement Receipt

EFS ID:	16828922
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	11-SEP-2013
Filing Date:	28-SEP-2011
Time Stamp:	18:17:42
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$180
RAM confirmation Number	5763
Deposit Account	505876
Authorized User	

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)

1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	3022758 aecf8fe0165e51b9cd5778a0909a5bacd8e5049a	no	16
Warnings:					
Information:					
This is not an USPTO supplied IDS fillable form					
2	Transmittal Letter	P037IDSLtr.pdf	341820 d274f48ba470cb0b5b16110dd26ab2c4b0ad125f	no	2
Warnings:					
Information:					
3	Foreign Reference	2034_STARHUB.pdf	656227 34c62e843998321805c9a9e280b3233bc8a53e75	no	22
Warnings:					
Information:					
4	Foreign Reference	2035_SONERA.pdf	1449270 83f568206d53812bd422a23bc97d8efdc212af6a	no	36
Warnings:					
Information:					
5	Foreign Reference	2036_SONY.pdf	831108 a6a0c393147acb9517804ca2ded34f2a1d36d44c	no	22
Warnings:					
Information:					
6	Non Patent Literature	3025_ANTON.PDF	608012 129dd45630f651b9102a169bcfd96b3eb3641016	no	37
Warnings:					
Information:					
7	Non Patent Literature	3026_RUCKUS.PDF	928924 8115313ba3be83f3712b9ae0005c09db2e99bdd5	no	7
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8	Non Patent Literature	3027_ACCURIS.PDF	1747360 ac5f8cd0c2e2bf88ebf182a1527d6143ca94b961	no	23
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9	Non Patent Literature	3028_WIRELESS.PDF	506452 25813a856d3ae61a06ff94ed223802f7babc3ecf	no	58

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10	Non Patent Literature	3029_THURSTON.PDF	54264 9682fa517747e51ab29fc34455cfab07819acf93	no	1
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11	Fee Worksheet (SB06)	fee-info.pdf	30480 ef5243a5bb47dcbb4ca8fa62acf0e929d04f360a	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	10176675		

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Petition
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

PETITION UNDER 37 C.F.R. § 1.78(a)(3) TO ACCEPT AN UNINTENTIONALLY DELAYED PRIORITY CLAIM UNDER 35 U.S.C. § 120

Madam:

Applicants respectfully submit this Petition Under 37 C.F.R. § 1.78(a)(3) to Accept an Unintentionally Delayed Priority Claim Under 35 U.S.C. § 120 ("the Petition").

The instant application is a continuation-in-part of several related co-pending applications. Applicants only recently noticed that the priority chains for some of the applications of which the instant application is a continuation-in-part were not set forth completely in the priority claim when the instant application was filed, nor were they set forth completely in the priority claim filed in a preliminary amendment on December 14, 2011. Applicants note, however, that each of the applications that would have been included in the priority chains, had the priority chains been set forth completely, were all referenced at least once elsewhere in the priority claim submitted in the preliminary amendment filed on December 14, 2011. Accordingly, no new matter is being added with the submission of this Petition.

Out of an abundance of caution, Applicants are filing this Petition to provide the complete priority chains for all of the applications referenced in the priority claim. The Petition also deletes, from the listing of applications of which the instant application is a continuation-in-

part, the reference to U.S. Application No. 12/380,771, which issued as U.S. Patent No. 8,023,425 before the instant application was filed.

The entire delay between the date the claim was due and the date the claim is being filed with this Petition was unintentional. Immediately after noticing that complete priority chains had not been set forth for some of the referenced applications in the instant application, and that the priority claims in several related applications likewise did not provide complete priority chains for all referenced applications, Applicants began preparing a set of petitions, including this Petition, to provide complete priority chains for all referenced applications.

As required by 37 C.F.R. § 1.78(a)(3), in addition to the statement above that the entire delay between the date the claim was due and the date the claim is being filed with this Petition was unintentional, this Petition is accompanied by:

(1) an application data sheet (ADS) containing the reference required by 35 U.S.C. § 120 and 37 C.F.R. § 1.78(a)(2); and

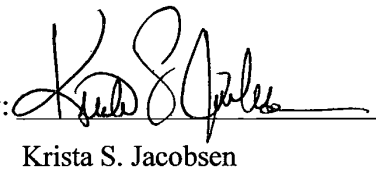
(2) the fee set forth in 37 C.F.R. § 1.17(t).

In addition, pursuant to 37 C.F.R. § 1.312, Applicants are submitting an Amendment After Allowance to amend the priority claim in the specification so that it reflects the information provided in the ADS being submitted with the Petition. Applicants have verified that the Amendment After Allowance does not incorporate by reference any applications that were not already incorporated by reference on the instant application's filing date.

CONCLUSION

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

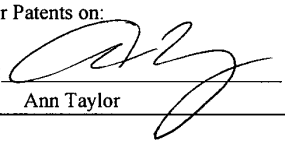
Respectfully submitted,

Date: August 30, 2013 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: Aug. 30, 2013 By: 
Ann Taylor

Application Data Sheet	Attorney Docket No.	RALEP037
	Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS	

Applicant Information:

Applicant 1 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Gregory
Middle Name:	G.
Family Name:	Raleigh
Residence Information:	
City:	Woodside
State:	CA
Country of Residence:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Applicant 2 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Alireza
Middle Name:	
Family Name:	Raissinia
Residence Information:	
City:	Monte Sereno
State:	CA
Country of Residence:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Applicant 3 -

Applicant Authority:	**Inventor**
Legal Name:	
First Name:	Jeffrey
Middle Name:	
Family Name:	Green
Residence Information:	
City:	Sunnyvale
State:	CA
Country of Residence:	USA
Mailing Address of Inventor:	350 Marine Parkway, Suite 300 Redwood Shores, CA 94065 USA

Correspondence Information:

Correspondence Address:	Customer Number 107265
E-mail address:	patent@headwaterllc.com

Application Information:

Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
Attorney Docket Number:	RALEP037
Small Entity Status Claimed:	Yes
Application Type:	Nonprovisional
Subject Matter:	Utility

Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Total Number of Drawing Sheets: 28

Suggested Drawing Figure for Publication: ---

Representative Information:

Customer Number: 107265

Domestic Benefit/National Stage Information:

This Application No. 13/248,028, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010

and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and is a CIP of Application No. 13/239,321, filed 09/21/2011
and is a CIP of Application No. 13/247,998, filed 09/28/2011
and is a CIP of Application No. 13/248,025, filed 09/28/2011
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,779, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,758, filed 03/02/2009

claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,768, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,780, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)

claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,770, filed 03/02/2009 (ABN)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
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and claims the benefit of Application No. 61/207,393, filed 02/10/2009
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and said Application No. 12/380,772, filed 03/02/2009
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and said Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
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and said Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)

claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
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and said Application No. 12/380,774, filed 03/02/2009
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and said Application No. 12/380,773, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
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and said Application No. 12/380,769, filed 03/02/2009
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
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and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/264,126, filed 11/24/2009

and said Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
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and claims the benefit of Application No. 61/207,739, filed 02/13/2009

and said Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
is a CIP of Application No. 12/380,780, filed 03/02/2009
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and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/275,208, filed 08/25/2009
and claims the benefit of Application No. 61/237,753, filed 08/28/2009

and said Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009

and said Application No. 12/694,451, filed 01/27/2010
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)

is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/264,120, filed 11/24/2009

and said Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
is a CIP of Application No. 12/380,780, filed 03/02/2009
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/252,151, filed 10/15/2009
and claims the benefit of Application No. 61/252,153, filed 10/15/2009

and said Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and claims the benefit of Application No. 61/206,354, filed 01/28/2009
and claims the benefit of Application No. 61/206,944, filed 02/04/2009
and claims the benefit of Application No. 61/207,393, filed 02/10/2009
and claims the benefit of Application No. 61/207,739, filed 02/13/2009
and claims the benefit of Application No. 61/270,353, filed 07/06/2009

and said Application No. 13/134,005, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)

and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and claims the benefit of Application No. 61/348,022, filed 05/25/2010
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/134,028, filed 05/25/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and claims the benefit of Application No. 61/348,022, filed 05/25/2010
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010

and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/229,580, filed 09/09/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,771, filed 03/02/2009 (PAT 8023425)
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010

and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and claims the benefit of Application No. 61/381,159, filed 09/09/2010
and claims the benefit of Application No. 61/381,162, filed 09/09/2010
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/237,827, filed 09/20/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009

and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and claims the benefit of Application No. 61/384,456, filed 09/20/2010
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/239,321, filed 09/21/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)

and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and claims the benefit of Application No. 61/385,020, filed 09/21/2010
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010

and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/247,998, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)
and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and is a CIP of Application No. 13/239,321, filed 09/21/2011

and is a CIP of Application No. 13/248,028, filed 09/28/2011
and is a CIP of Application No. 13/248,025, filed 09/28/2011
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

and said Application No. 13/248,025, filed 09/28/2011
is a CIP of Application No. 12/380,759, filed 03/02/2009 (PAT 8270310)
and is a CIP of Application No. 12/380,779, filed 03/02/2009
and is a CIP of Application No. 12/380,758, filed 03/02/2009
and is a CIP of Application No. 12/380,778, filed 03/02/2009 (PAT 8321526)
and is a CIP of Application No. 12/380,768, filed 03/02/2009
and is a CIP of Application No. 12/380,767, filed 03/02/2009 (PAT 8355337)
and is a CIP of Application No. 12/380,780, filed 03/02/2009
and is a CIP of Application No. 12/380,755, filed 03/02/2009 (PAT 8331901)
and is a CIP of Application No. 12/380,756, filed 03/02/2009 (PAT 8250207)
and is a CIP of Application No. 12/380,770, filed 03/02/2009 (ABN)
and is a CIP of Application No. 12/380,772, filed 03/02/2009
and is a CIP of Application No. 12/380,782, filed 03/02/2009 (PAT 8270952)
and is a CIP of Application No. 12/380,783, filed 03/02/2009
and is a CIP of Application No. 12/380,757, filed 03/02/2009 (PAT 8326958)
and is a CIP of Application No. 12/380,781, filed 03/02/2009 (PAT 8229812)
and is a CIP of Application No. 12/380,774, filed 03/02/2009
and is a CIP of Application No. 12/380,773, filed 03/02/2009
and is a CIP of Application No. 12/380,769, filed 03/02/2009
and is a CIP of Application No. 12/380,777, filed 03/02/2009
and is a CIP of Application No. 12/695,019, filed 01/27/2010 (PAT 8275830)

and is a CIP of Application No. 12/695,020, filed 01/27/2010 (PAT 8406748)
and is a CIP of Application No. 12/694,445, filed 01/27/2010 (PAT 8391834)
and is a CIP of Application No. 12/694,451, filed 01/27/2010
and is a CIP of Application No. 12/694,455, filed 01/27/2010 (PAT 8402111)
and is a CIP of Application No. 12/695,021, filed 01/27/2010 (PAT 8346225)
and is a CIP of Application No. 12/695,980, filed 01/28/2010 (PAT 8340634)
and is a CIP of Application No. 13/134,005, filed 05/25/2011
and is a CIP of Application No. 13/134,028, filed 05/25/2011
and is a CIP of Application No. 13/229,580, filed 09/09/2011
and is a CIP of Application No. 13/237,827, filed 09/20/2011
and is a CIP of Application No. 13/239,321, filed 09/21/2011
and is a CIP of Application No. 13/248,028, filed 09/28/2011
and is a CIP of Application No. 13/247,998, filed 09/28/2011
and claims the benefit of Application No. 61/387,243, filed 09/28/2010
and claims the benefit of Application No. 61/387,247, filed 09/28/2010
and claims the benefit of Application No. 61/389,547, filed 10/04/2010
and claims the benefit of Application No. 61/407,358, filed 10/27/2010
and claims the benefit of Application No. 61/418,507, filed 12/01/2010
and claims the benefit of Application No. 61/418,509, filed 12/01/2010
and claims the benefit of Application No. 61/420,727, filed 12/07/2010
and claims the benefit of Application No. 61/422,565, filed 12/13/2010
and claims the benefit of Application No. 61/422,572, filed 12/13/2010
and claims the benefit of Application No. 61/422,574, filed 12/13/2010
and claims the benefit of Application No. 61/435,564, filed 01/24/2011
and claims the benefit of Application No. 61/472,606, filed 04/06/2011

Foreign Priority Information:

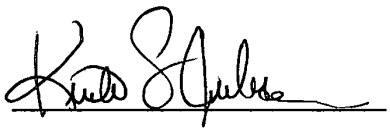
None.

Application Data Sheet		Attorney Docket No.	RALEP037
		Application Number	13/248,028
Title of Invention	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS		

Assignee Information:

Assignee is:	The Assignee, which is an Organization
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Signature:

Signature: 

Date: August 30, 2013

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Registration Number: 59,374

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

AMENDMENT AFTER NOTICE OF ALLOWANCE

Madam:

Pursuant to 37 C.F.R. § 1.312, please amend the above-identified application as follows:

Amendments to the Specification begin on page 2.

Remarks begin on page 13.

AMENDMENTS TO THE SPECIFICATION

Please replace paragraphs **[0001]** through **[0003]** of the specification with the following re-written paragraphs:

[0001a] This application is a continuation-in-part of the following U.S. non-provisional patent applications: U.S. Application No. 12/380,759 (Attorney Docket No. RALEP001), filed March 2, 2009, entitled VERIFIABLE DEVICE ASSISTED SERVICE POLICY IMPLEMENTATION, now U.S. Patent No. 8,270,310 (issued on September 18, 2012); U.S. Application No. 12/380,779 (Attorney Docket No. RALEP002), filed March 2, 2009, entitled DEVICE ASSISTED SERVICE PROFILE MANAGEMENT WITH USER PREFERENCE, ADAPTIVE POLICY, NETWORK NEUTRALITY, AND USER PRIVACY; U.S. Application No. 12/380,758 (Attorney Docket No. RALEP003), filed March 2, 2009, entitled VERIFIABLE DEVICE ASSISTED SERVICE USAGE MONITORING WITH REPORTING, SYNCHRONIZATION, AND NOTIFICATION; U.S. Application No. 12/380,778 (Attorney Docket No. RALEP004), filed March 2, 2009, entitled VERIFIABLE DEVICE ASSISTED SERVICE USAGE BILLING WITH INTEGRATED ACCOUNTING, MEDIATION ACCOUNTING, AND MULTI-ACCOUNT, now U.S. Patent No. 8,321,526 (issued on November 27, 2012); U.S. Application No. 12/380,768 (Attorney Docket No. RALEP005), filed March 2, 2009, entitled NETWORK BASED SERVICE POLICY IMPLEMENTATION WITH NETWORK NEUTRALITY AND USER PRIVACY; U.S. Application No. 12/380,767 (Attorney Docket No. RALEP006), filed March 2, 2009, entitled NETWORK BASED SERVICE PROFILE MANAGEMENT WITH USER PREFERENCE, ADAPTIVE POLICY, NETWORK NEUTRALITY AND USER PRIVACY, now U.S. Patent No. 8,355,337 (issued on January 15, 2013); U.S. Application No. 12/380,780 (Attorney Docket No. RALEP007), filed March 2, 2009, entitled AUTOMATED DEVICE PROVISIONING AND ACTIVATION; U.S. Application No. 12/380,755 (Attorney Docket No. RALEP008), filed March 2, 2009, entitled DEVICE ASSISTED AMBIENT SERVICES, now U.S. Patent No. 8,331,901 (issued December 11, 2012); U.S. Application No. 12/380,756 (Attorney Docket No. RALEP009), filed March 2, 2009, entitled NETWORK BASED AMBIENT SERVICES, now U.S. Patent No. 8,250,207 (issued August 21, 2012); U.S. Application No. 12/380,770 (Attorney Docket No. RALEP010), filed March 2, 2009, entitled NETWORK TOOLS FOR ANALYSIS, DESIGN,

TESTING, AND PRODUCTION OF SERVICES, now abandoned; U.S. Application No. 12/380,772 (Attorney Docket No. RALEP011), filed March 2, 2009, entitled ROAMING SERVICES NETWORK AND OVERLAY NETWORKS; U.S. Application No. 12/380,782 (Attorney Docket No. RALEP012), filed March 2, 2009, entitled OPEN DEVELOPMENT SYSTEM FOR ACCESS SERVICE PROVIDERS, now U.S. Patent No. 8,270,952 (issued September 18, 2012); U.S. Application No. 12/380,783 (Attorney Docket No. RALEP013), filed March 2, 2009, entitled VIRTUAL SERVICE PROVIDER SYSTEMS; U.S. Application No. 12/380,757 (Attorney Docket No. RALEP014), filed March 2, 2009, entitled SERVICE ACTIVATION TRACKING SYSTEM, now U.S. Patent No. 8,326,958 (issued December 4, 2012); U.S. Application No. 12/380,781 (Attorney Docket No. RALEP015), filed March 2, 2009, entitled OPEN TRANSACTION CENTRAL BILLING SYSTEM, now U.S. Patent No. 8,229,812 (issued July 24, 2012); U.S. Application No. 12/380,774 (Attorney Docket No. RALEP016), filed March 2, 2009, entitled VERIFIABLE AND ACCURATE SERVICE USAGE MONITORING FOR INTERMEDIATE NETWORKING DEVICES; U.S. Application No. 12/380,773 (Attorney Docket No. RALEP018), filed March 2, 2009, entitled VERIFIABLE SERVICE POLICY IMPLEMENTATION FOR INTERMEDIATE NETWORKING DEVICES; U.S. Application No. 12/380,769 (Attorney Docket No. RALEP019), filed March 2, 2009, entitled SERVICE PROFILE MANAGEMENT WITH USER PREFERENCE, ADAPTIVE POLICY, NETWORK NEUTRALITY AND USER PRIVACY FOR INTERMEDIATE NETWORKING DEVICES; U.S. Application No. 12/380,777 (Attorney Docket No. RALEP020), filed March 2, 2009, entitled SIMPLIFIED SERVICE NETWORK ARCHITECTURE, each of which claims the benefit of U.S. Provisional Application Nos. 61/206,354 (Attorney Docket No. RALEP001+), filed January 28, 2009, entitled SERVICES POLICY COMMUNICATION SYSTEM AND METHOD; 61/206,944 (Attorney Docket No. RALEP002+), filed February 4, 2009, entitled SERVICES POLICY COMMUNICATION SYSTEM AND METHOD; 61/207,393 (Attorney Docket No. RALEP003+), filed February 10, 2009, entitled SERVICES POLICY COMMUNICATION SYSTEM AND METHOD; and 61/207,739 (Attorney Docket No. RALEP004+), entitled SERVICES POLICY COMMUNICATION SYSTEM AND METHOD, filed February 13, 2009.

[0001b] This application is also a continuation-in-part of U.S. Application No. 12/695,019 (Attorney Docket No. RALEP022), filed January 27, 2010, entitled DEVICE ASSISTED CDR CREATION, AGGREGATION, MEDIATION AND BILLING, now U.S. Patent No. 8,275,830 (issued September 25, 2012), which is a continuation-in-part of above-referenced U.S. Application No. 12/380,778, filed March 2, 2009, and is also a continuation-in-part of U.S. Application No. 12/380,771 (Attorney Docket No. RALEP017), filed March 2, 2009, entitled VERIFIABLE SERVICE BILLING FOR INTERMEDIATE NETWORKING DEVICES, now U.S. Patent No. 8,023,425 (issued September 20, 2011), and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; 61/270,353 (Attorney Docket No. RALEP022+), filed July 6, 2009, entitled DEVICE ASSISTED CDR CREATION, AGGREGATION, MEDIATION AND BILLING; and 61/264,126 (Attorney Docket No. RALEP028+), filed November 24, 2009, entitled DEVICE ASSISTED SERVICES ACTIVITY MAP. Above-referenced U.S. Application No. 12/380,771, filed March 2, 2009, claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009, 61/206,944, filed February 4, 2009, 61/207,393, filed February 10, 2009, and 61/207,739, filed February 13, 2009.

[0001c] This application is also a continuation-in-part of U.S. Application No. 12/695,020 (Attorney Docket No. RALEP024), filed January 27, 2010, entitled ADAPTIVE AMBIENT SERVICES, now U.S. Patent No. 8,406,748 (issued on March 26, 2013), which is a continuation-in-part of above-referenced U.S. Application No. 12/380,780, filed March 2, 2009, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; 61/275,208 (Attorney Docket No. RALEP023+), filed August 25, 2009, entitled ADAPTIVE AMBIENT SERVICES; and 61/237,753 (Attorney Docket No. RALEP024+), filed August 28, 2009, entitled ADAPTIVE AMBIENT SERVICES.

[0001d] This application is also a continuation-in-part of U.S. Application No. 12/694,445 (Attorney Docket No. RALEP025), filed January 27, 2010, entitled SECURITY TECHNIQUES FOR DEVICE ASSISTED SERVICES, now U.S. Patent No. 8,391,834 (issued March 5, 2013), which is a continuation-in-part of above-referenced U.S. Application No. 12/380,780, filed

March 2, 2009, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; and 61/252,151 (Attorney Docket No. RALEP025+), filed October 15, 2009, entitled SECURITY TECHNIQUES FOR DEVICE ASSISTED SERVICES.

[0001e] This application is also a continuation-in-part of U.S. Application No. 12/694,451 (Attorney Docket No. RALEP026), filed January 27, 2010, entitled DEVICE GROUP PARTITIONS AND SETTLEMENT PLATFORM, which is a continuation-in-part of above-referenced U.S. Application No. 12/380,780, filed March 2, 2009, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; 61/270,353, filed July 6, 2009; and 61/252,153 (Attorney Docket No. RALEP026+), filed October 15, 2009, entitled DEVICE GROUP PARTITIONS AND SETTLEMENT PLATFORM.

[0001f] This application is also a continuation-in-part of U.S. Application No. 12/694,455 (Attorney Docket No. RALEP027), filed January 27, 2010, entitled DEVICE ASSISTED SERVICES INSTALL, now U.S. Patent No. 8,402,111 (issued on March 19, 2013), which is a continuation-in-part of above-referenced U.S. Application No. 12/380,780, filed March 2, 2009, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; and 61/264,120 (Attorney Docket No. RALEP027+), filed November 24, 2009, entitled DEVICE ASSISTED SERVICES INSTALL.

[0001g] This application is also a continuation-in-part of U.S. Application No. 12/695,021 (Attorney Docket No. RALEP029), filed January 27, 2010, entitled QUALITY OF SERVICE FOR DEVICE ASSISTED SERVICES, now U.S. Patent No. 8,346,225 (issued January 1, 2013), which is a continuation-in-part of above-referenced U.S. Application No. 12/380,780, filed March 2, 2009, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; 61/252,151, filed October 15, 2009; and 61/252,153, filed October 15, 2009.

[0001h] This application is also a continuation-in-part of U.S. Application No. 12/695,980 (Attorney Docket No. RALEP030), filed January 28, 2010, entitled ENHANCED ROAMING SERVICES AND CONVERGED CARRIER NETWORKS WITH DEVICE ASSISTED SERVICES AND A PROXY, now U.S. Patent No. 8,340,634 (issued December 25, 2012), which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,780, filed March 2, 2009; 12/695,019, filed January 27, 2010; and 12/695,021, filed January 27, 2010, and which claims the benefit of U.S. Provisional Application Nos. 61/206,354, filed January 28, 2009; 61/206,944, filed February 4, 2009; 61/207,393, filed February 10, 2009; 61/207,739, filed February 13, 2009; and 61/270,353, filed July 6, 2009.

[0001i] This application is also a continuation-in-part of U.S. Application No. 13/134,005 (Attorney Docket No. RALEP049), filed May 25, 2011, entitled SYSTEM AND METHOD FOR WIRELESS NETWORK OFFLOADING, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,771, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; and 12/695,980, filed January 28, 2010, and which claims the benefit of U.S. Provisional Application Nos. 61/348,022 (Attorney Docket No. RALEP031+), filed May 25, 2010, entitled DEVICE ASSISTED SERVICES FOR PROTECTING NETWORK CAPACITY; 61/381,159 (Attorney Docket No. RALEP032+), filed September 9, 2010, entitled DEVICE ASSISTED SERVICES FOR PROTECTING NETWORK CAPACITY; 61/381,162 (Attorney Docket No. RALEP033+), filed September 9, 2010, entitled SERVICE CONTROLLER INTERFACES AND WORKFLOWS; 61/384,456 (Attorney Docket No. RALEP034+), filed September 20, 2010, entitled SECURING SERVICE PROCESSOR WITH SPONSORED SIMS; 61/389,547 (Attorney Docket No. RALEP035+), filed October 4, 2010, entitled USER NOTIFICATIONS

FOR DEVICE ASSISTED SERVICES; 61/385,020 (Attorney Docket No. RALEP036+), filed September 21, 2010, entitled SERVICE USAGE RECONCILIATION SYSTEM OVERVIEW; 61/387,243 (Attorney Docket No. RALEP037+), filed September 28, 2010, entitled ENTERPRISE AND CONSUMER BILLING ALLOCATION FOR WIRELESS COMMUNICATION DEVICE SERVICE USAGE ACTIVITIES; 61/387,247 (Attorney Docket No. RALEP038+), filed September 28, 2010 entitled SECURED DEVICE DATA RECORDS; 61/407,358 (Attorney Docket No. RALEP039+), filed October 27, 2010, entitled SERVICE CONTROLLER AND SERVICE PROCESSOR ARCHITECTURE; 61/418,507 (Attorney Docket No. RALEP040+), filed December 1, 2010, entitled APPLICATION SERVICE PROVIDER INTERFACE SYSTEM; 61/418,509 (Attorney Docket No. RALEP041+), filed December 1, 2010, entitled SERVICE USAGE REPORTING RECONCILIATION AND FRAUD DETECTION FOR DEVICE ASSISTED SERVICES; 61/420,727 (Attorney Docket No. RALEP042+), filed December 7, 2010, entitled SECURE DEVICE DATA RECORDS; 61/422,565 (Attorney Docket No. RALEP043+), filed December 13, 2010, entitled SERVICE DESIGN CENTER FOR DEVICE ASSISTED SERVICES; 61/422,572 (Attorney Docket No. RALEP044+), filed December 13, 2010, entitled SYSTEM INTERFACES AND WORKFLOWS FOR DEVICE ASSISTED SERVICES; 61/422,574 (Attorney Docket No. RALEP045+), filed December 13, 2010, entitled SECURITY AND FRAUD DETECTION FOR DEVICE ASSISTED SERVICES; 61/435,564 (Attorney Docket No. RALEP046+), filed January 24, 2011, entitled FRAMEWORK FOR DEVICE ASSISTED SERVICES; and 61/472,606 (Attorney Docket No. RALEP047+), filed April 6, 2011, entitled MANAGING SERVICE USER DISCOVERY AND SERVICE LAUNCH OBJECT PLACEMENT ON A DEVICE.

[0001j] This application is also a continuation-in-part of U.S. Application No.13/134,028 (Attorney Docket No. RALEP032), filed May 25, 2011, entitled DEVICE-ASSISTED SERVICES FOR PROTECTING NETWORK CAPACITY, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed

March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,771, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; 12/695,980, filed January 28, 2010; and 13/134,005, filed May 25, 2011, and which claims the benefit of U.S. Provisional Application Nos. 61/348,022, filed May 25, 2010; 61/381,159, filed September 9, 2010; 61/381,162, filed September 9, 2010; 61/384,456, filed September 20, 2010; 61/389,547, filed October 4, 2010; 61/385,020, filed September 21, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0001k] This application is also a continuation-in-part of U.S. Application No.13/229,580 (Attorney Docket No. RALEP033), filed September 9, 2011, entitled WIRELESS NETWORK SERVICE INTERFACES, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,771, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; 12/695,980, filed January 28, 2010; 13/134,005, filed May 25, 2011; and 13/134,028, filed May 25, 2011, and which claims the benefit of U.S. Provisional Application Nos. 61/381,159, filed September 9, 2010; 61/381,162, filed September 9, 2010; 61/384,456, filed September 20, 2010; 61/389,547, filed October 4, 2010; 61/385,020, filed September 21, 2010; 61/387,243, filed September 28, 2010;

61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0001l] This application is also a continuation-in-part of U.S. Application No.13/237,827 (Attorney Docket No. RALEP034), filed September 20, 2011, entitled ADAPTING NETWORK POLICIES BASED ON DEVICE SERVICE PROCESSOR CONFIGURATION, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; 12/695,980, filed January 28, 2010; 13/134,005, filed May 25, 2011; 13/134,028, filed May 25, 2011; and 13/229,580, filed September 9, 2011, and which claims the benefit of U.S. Provisional Application Nos. 61/384,456, filed September 20, 2010; 61/389,547, filed October 4, 2010; 61/385,020, filed September 21, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0001m] This application is also a continuation-in-part of U.S. Application No.13/239,321 (Attorney Docket No. RALEP036), filed September 21, 2011, entitled SERVICE OFFER SET PUBLISHING TO DEVICE AGENT WITH ON-DEVICE SERVICE SELECTION, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed

March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; 12/695,980, filed January 28, 2010; 13/134,005, filed May 25, 2011; 13/134,028, filed May 25, 2011; 13/229,580, filed September 9, 2011; and 13/237,827, filed September 20, 2011, and which claims the benefit of U.S. Provisional Application Nos. 61/389,547, filed October 4, 2010; 61/385,020, filed September 21, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0001n] This application is also a continuation-in-part of U.S. Application No.13/247,998 (Attorney Docket No. RALEP038), filed September 28, 2011, entitled SECURE DEVICE DATA RECORDS, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; 12/695,980, filed January 28, 2010; 13/134,005, filed May 25, 2011; 13/134,028, filed May 25, 2011; 13/229,580, filed September 9, 2011; 13/237,827, filed September 20, 2011; 13/239,321, filed September 21, 2011; 13/248,028, filed September 28,

2011; and U.S. Application No. 13/248,025 (Attorney Docket No. RALEP043), filed September 28, 2011, entitled SERVICE DESIGN CENTER FOR DEVICE ASSISTED SERVICES, and which claims the benefit of U.S. Provisional Application Nos. 61/389,547, filed October 4, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0001o] This application is also a continuation-in-part of above-referenced U.S. Application No. 13/248,025, filed September 28, 2011, which is a continuation-in-part of above-referenced U.S. Application Nos. 12/380,759, filed March 2, 2009; 12/380,779, filed March 2, 2009; 12/380,758, filed March 2, 2009; 12/380,778, filed March 2, 2009; 12/380,768, filed March 2, 2009; 12/380,767, filed March 2, 2009; 12/380,780, filed March 2, 2009; 12/380,755, filed March 2, 2009; 12/380,756, filed March 2, 2009; 12/380,770, filed March 2, 2009; 12/380,772, filed March 2, 2009; 12/380,782, filed March 2, 2009; 12/380,783, filed March 2, 2009; 12/380,757, filed March 2, 2009; 12/380,781, filed March 2, 2009; 12/380,774, filed March 2, 2009; 12/380,773, filed March 2, 2009; 12/380,769, filed March 2, 2009; 12/380,777, filed March 2, 2009; 12/695,019, filed January 27, 2010; 12/695,020, filed January 27, 2010; 12/694,445, filed January 27, 2010; 12/694,451, filed January 27, 2010; 12/694,455, filed January 27, 2010; 12/695,021, filed January 27, 2010; and 12/695,980, filed January 28, 2010; 13/134,005, filed May 25, 2011; 13/134,028, filed May 25, 2011; 13/229,580, filed September 9, 2011; 13/237,827, filed September 20, 2011; 13/239,321, filed September 21, 2011; 13/248,028, filed September 28, 2011; and 13/247,998, filed September 28, 2011, and which claims the benefit of U.S. Provisional Application Nos. 61/389,547, filed October 4, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0002] Additionally, this application claims the benefit of the following U.S. Provisional Applications: 61/389,547, filed October 4, 2010; 61/387,243, filed September 28, 2010; 61/387,247, filed September 28; 61/407,358, filed October 27, 2010; 61/418,507, filed December 1, 2010; 61/418,509, filed December 1, 2010; 61/420,727, filed December 7, 2010; 61/422,565, filed December 13, 2010; 61/422,572, filed December 13, 2010; 61/422,574, filed December 13, 2010; 61/435,564, filed January 24, 2011; and 61/472,606, filed April 6, 2011.

[0003] All of the above-identified patents and applications are hereby incorporated by reference.

REMARKS

On the same day this Amendment After Allowance is being filed, Applicants are also filing a Petition Under 37 C.F.R. § 1.78(a)(3) to Accept an Unintentionally Delayed Priority Claim Under 35 U.S.C. § 120 ("the Petition"). As required by 37 C.F.R. § 1.78, the Petition is accompanied by an application data sheet (ADS) containing the reference required by 35 U.S.C. § 120 and 37 C.F.R. § 1.78(a)(2).

In this amendment, paragraphs [0001] through [0003] of the specification are being replaced by paragraphs [0001a]-[0001o], [0002], and [0003] to reflect the contents of the ADS being filed with the Petition.

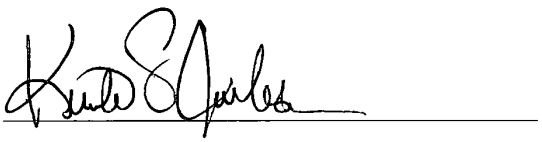
Applicants have verified that the replacement paragraphs do not incorporate by reference any applications that were not already incorporated by reference on the application's filing date.

CONCLUSION

Applicants respectfully request entry of the amendments provided herein. If the Examiner has any questions or needs any additional information, the Examiner is invited to contact the undersigned.

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

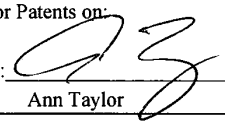
Respectfully submitted,

Date: August 30, 2013 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: Aug. 30, 2013 By: 
Ann Taylor

Electronic Patent Application Fee Transmittal

Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]

Filed as Small Entity

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Priority Accept Unintent Delayed Claim	2454	1	710	710
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
			Total in USD ($)	**710**

Electronic Acknowledgement Receipt	
EFS ID:	16740243
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	30-AUG-2013
Filing Date:	28-SEP-2011
Time Stamp:	22:05:52
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$710
RAM confirmation Number	7643
Deposit Account	505876
Authorized User	
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.16 (National application filing, search, and examination fees) Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees)	

Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees)
Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees)
Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Petition for review by the Office of Petitions.	P037Petition.pdf	191549 c9e2aadcce0e391e803fcd41f67ef6bbd383f543	no	3
Warnings:					
Information:					
2	Application Data Sheet	P037ADS.pdf	302046 40428bf7fd809592cf076a845179ace219f607d8	no	19
Warnings:					
Information:					
This is not an USPTO supplied ADS fillable form					
3	Amendment after Notice of Allowance (Rule 312)	P037Amd.pdf	263680 184353775633511bc23d72c57ce35730a0b33c1b	no	14
Warnings:					
Information:					
4	Fee Worksheet (SB06)	fee-info.pdf	30320 27116323440b0765c543126583a3c759914a479c	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	787595		

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

<u>New Applications Under 35 U.S.C. 111</u>
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

<u>National Stage of an International Application under 35 U.S.C. 371</u>
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

<u>New International Application Filed with the USPTO as a Receiving Office</u>
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 08/26/2013

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	
ART UNIT	**PAPER NUMBER**
3687	

NOTIFICATION DATE	DELIVERY MODE
08/26/2013	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patent@headwaterllc.com

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U.S. Patent and Trademark Office
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Alexandria, Virginia 22313-1450

APPLICATION NO./ CONTROL NO.	FILING DATE	FIRST NAMED INVENTOR / PATENT IN REEXAMINATION	ATTORNEY DOCKET NO.
13/248,028	28 September, 2011	RALEIGH ET AL.	RALEP037 [26WV-160514]

		EXAMINER	
Headwater Partners I LLC - Outside Firm 1 350 Marine Parkway, Suite 300 Redwood Shores, CA 94065		ANDREW JOSEPH RUDY	
		ART UNIT	PAPER
		3687	20130820

DATE MAILED:

Please find below and/or attached an Office communication concerning this application or proceeding.

Commissioner for Patents

Applicant's Information Disclosure Statement (IDS) submitted June 27, 2013 has been reviewed. Note the attached IDS.

/ANDREW JOSEPH RUDY/
Primary Examiner
Art Unit: 3687

PTO-90C (Rev.04-03)

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	7457265		2008-11-25	Julka, Vibhor et al.	
	2	7729326		2010-06-01	Sekhar, Ramesh	
	3	7929973		2011-04-19	Zavalkovsky, Arthur et al.	
	4	7945945		2011-05-17	Graham, Richard et al.	
	5	8059530		2011-11-15	Cole, Terry L.	
	6	8266681		2012-09-11	Deshpande, Sumit B. et al.	
	7	8280354		2012-10-02	Smith, Christopher et al.	
	8	8331293		2012-12-11	Sood, Kapil	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7545782		2009-06-09	Rayment, Stephen G. et al.	
	10	7039037		2006-05-02	Wang, Jiwei R. et al.	
	11	6928280		2005-08-09	Xanthos, James et al.	
	12	6765925		2004-07-20	Sawyer, Wilson et al.	
	13	5889477		1999-03-30	Fastenrath, Ulrich	
	14	8347362		2013-01-01	Cai, Yigang et al.	
	15	8315718		2012-11-20	Caffrey, Paul Oliver et al.	
	16	8332517		2012-12-11	Russell, Jesse E.	
	17	8005009		2011-08-23	McKee, Neil et al.	
	18	7760861		2010-07-20	Croak, Marian et al.	
	19	8060463		2011-11-15	Spiegel, Joel R.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8224773		2012-07-17	Spiegel, Joel R.	
	21	8352980		2013-01-08	Howcroft, Jerald Robert	
	22	8386386		2013-02-26	Zhu, Kevin	
	23	8340718		2012-12-25	Colonna, Massimo et al.	
	24	8385896		2013-02-26	Proctor, Jr., James A. et al.	
	25	8320949		2012-11-27	Matta, Sudheer Poorna Chandra	
	26	8279864		2012-10-02	Wood, Daniel M.	
	27	8271045		2012-09-18	Parolkar, Satish et al.	
	28	8233883		2012-07-31	De Froment, Eric	
	29	8224382		2012-07-17	Bultman, Michael J.	
	30	8184590		2012-05-22	Rosenblatt, Ariel	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	31	8174970		2012-05-08	Adamczyk, Maria et al.	
	32	8165576		2012-04-24	Raju, Vishwanath et al.	
	33	8073721		2011-12-06	Lewis, Lundy	
	34	8032899		2011-10-04	Archer, Charles J. et al.	
	35	7974624		2011-07-05	Gallagher, Michael D. et al.	
	36	7907970		2011-03-15	Park, Vincent D. et al.	
	37	7778176		2010-08-17	Morford, Michael Robert|	
	38	7725570		2010-05-25	Lewis, Lundy	
	39	7634388		2009-12-15	Archer, Charles J. et al.	
	40	7633438		2009-12-15	Tysowski, Piotr Konrad	
	41	7593417		2009-09-22	Wang, James et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	42	7551922		2009-06-23	Roskowski, Steve et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20080120668		2008-05-22	Yau, Frank Chuen-Foo	
	2	20030171112		2003-09-11	Lupper, Alfred et al.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	1889777A	CN		2006-07-19	Huawei Tech. Co. Ltd.		☐
	2	101155343A	CN		2006-09-29	Huawei Tech. Co. Ltd.		☐
	3	101035308A	CN		2006-03-09	Huawei Tech. Co. Ltd.		☐
	4	2007124279	WO		2007-11-01	Cisco Technology, Inc.		☐

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NON-PATENT LITERATURE DOCUMENTS

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	08/20/2013

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY.DOCKET.NO	TOT CLAIMS	IND CLAIMS
13/248,028	09/28/2011	3687	1750	RALEP037 [26WV-160514]	25	4

CONFIRMATION NO. 8510

CORRECTED FILING RECEIPT

107265
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065



Date Mailed: 07/24/2013

Receipt is acknowledged of this non-provisional patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please submit a written request for a Filing Receipt Correction. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections**

Inventor(s)

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

Applicant(s)

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Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

Power of Attorney: The patent practitioners associated with Customer Number 107265

Domestic Priority data as claimed by applicant

This application is a CIP of 12/380,759 03/02/2009 PAT 8270310
which is a CIP of 12/380,779 03/02/2009
This application 13/248,028
is a CIP of 12/380,758 03/02/2009
and is a CIP of 12/380,778 03/02/2009 PAT 8321526
and is a CIP of 12/380,768 03/02/2009
and is a CIP of 12/380,767 03/02/2009 PAT 8355337
and is a CIP of 12/380,780 03/02/2009
and is a CIP of 12/380,755 03/02/2009 PAT 8331901
and is a CIP of 12/380,756 03/02/2009 PAT 8250207
and is a CIP of 12/380,770 03/02/2009 ABN
and is a CIP of 12/380,771 03/02/2009 PAT 8023425
and is a CIP of 12/380,772 03/02/2009
and is a CIP of 12/380,782 03/02/2009 PAT 8270952
and is a CIP of 12/380,783 03/02/2009

and is a CIP of 12/380,757 03/02/2009 PAT 8326958
and is a CIP of 12/380,781 03/02/2009 PAT 8229812
and is a CIP of 12/380,774 03/02/2009
and is a CIP of 12/380,773 03/02/2009
and is a CIP of 12/380,769 03/02/2009
and is a CIP of 12/380,777 03/02/2009
and is a CIP of 12/695,019 01/27/2010 PAT 8275830
and is a CIP of 12/695,020 01/27/2010 PAT 8406748
which is a CIP of 12/394,445 02/27/2009 PAT 8418148
This application 13/248,028
is a CIP of 12/694,451 01/27/2010
and is a CIP of 12/394,455 02/27/2009 PAT 8109801
and is a CIP of 12/695,021 01/27/2010 PAT 8346225
and is a CIP of 12/695,980 01/28/2010 PAT 8340634
and is a CIP of 13/134,028 05/25/2011
which is a CIP of 12/134,005 06/05/2008 PAT 7518809
This application 13/248,028
is a CIP of 13/237,827 09/20/2011
and is a CIP of 13/239,321 09/21/2011
and is a CIP of 13/247,998 09/28/2011
and is a CIP of 13/248,025 09/28/2011
and claims benefit of 61/387,243 09/28/2010
and claims benefit of 61/387,247 09/28/2010
and claims benefit of 61/389,547 10/04/2010
and claims benefit of 61/407,358 10/27/2010
and claims benefit of 61/418,507 12/01/2010
and claims benefit of 61/418,509 12/01/2010
and claims benefit of 61/420,727 12/07/2010
and claims benefit of 61/422,565 12/13/2010
and claims benefit of 61/422,572 12/13/2010
and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

Foreign Applications for which priority is claimed (You may be eligible to benefit from the **Patent Prosecution Highway** program at the USPTO. Please see http://www.uspto.gov for more information.) - None.
Foreign application information must be provided in an Application Data Sheet in order to constitute a claim to foreign priority. See 37 CFR 1.55 and 1.76.

Permission to Access - A proper **Authorization to Permit Access to Application by Participating Offices** (PTO/SB/39 or its equivalent) has been received by the USPTO.

If Required, Foreign Filing License Granted: 10/14/2011

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 13/248,028**

Projected Publication Date: Not Applicable

Non-Publication Request: No

Early Publication Request: No
**** SMALL ENTITY ****

Title

ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

Preliminary Class

705

Statement under 37 CFR 1.55 or 1.78 for AIA (First Inventor to File) Transition Applications:

PROTECTING YOUR INVENTION OUTSIDE THE UNITED STATES

Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

Almost every country has its own patent law, and a person desiring a patent in a particular country must make an application for patent in that country in accordance with its particular laws. Since the laws of many countries differ in various respects from the patent law of the United States, applicants are advised to seek guidance from specific foreign countries to ensure that patent rights are not lost prematurely.

Applicants also are advised that in the case of inventions made in the United States, the Director of the USPTO must issue a license before applicants can apply for a patent in a foreign country. The filing of a U.S. patent application serves as a request for a foreign filing license. The application's filing receipt contains further information and guidance as to the status of applicant's license for foreign filing.

Applicants may wish to consult the USPTO booklet, "General Information Concerning Patents" (specifically, the section entitled "Treaties and Foreign Patents") for more information on timeframes and deadlines for filing foreign patent applications. The guide is available either by contacting the USPTO Contact Center at 800-786-9199, or it can be viewed on the USPTO website at http://www.uspto.gov/web/offices/pac/doc/general/index.html.

For information on preventing theft of your intellectual property (patents, trademarks and copyrights), you may wish to consult the U.S. Government website, http://www.stopfakes.gov. Part of a Department of Commerce initiative, this website includes self-help "toolkits" giving innovators guidance on how to protect intellectual property in specific countries such as China, Korea and Mexico. For questions regarding patent enforcement issues, applicants may call the U.S. Government hotline at 1-866-999-HALT (1-866-999-4258).

LICENSE FOR FOREIGN FILING UNDER

Title 35, United States Code, Section 184

Title 37, Code of Federal Regulations, 5.11 & 5.15

GRANTED

The applicant has been granted a license under 35 U.S.C. 184, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" followed by a date appears on this form. Such licenses are issued in all applications where the conditions for issuance of a license have been met, regardless of whether or not a license may be required as set forth in 37 CFR 5.15. The scope and limitations of this license are set forth in 37 CFR 5.15(a) unless an earlier license has been issued under 37 CFR 5.15(b). The license is subject to revocation upon written notification. The date indicated is the effective date of the license, unless an earlier license of similar scope has been granted under 37 CFR 5.13 or 5.14.

This license is to be retained by the licensee and may be used at any time on or after the effective date thereof unless it is revoked. This license is automatically transferred to any related applications(s) filed under 37 CFR 1.53(d). This license is not retroactive.

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NOT GRANTED

No license under 35 U.S.C. 184 has been granted at this time, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" DOES NOT appear on this form. Applicant may still petition for a license under 37 CFR 5.12, if a license is desired before the expiration of 6 months from the filing date of the application. If 6 months has lapsed from the filing date of this application and the licensee has not received any indication of a secrecy order under 35 U.S.C. 181, the licensee may foreign file the application pursuant to 37 CFR 5.15(b).

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UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]

CONFIRMATION NO. 8510

107265
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

IMPROPER CFR REQUEST

OC000000062695792

Date Mailed: 07/24/2013

RESPONSE TO REQUEST FOR CORRECTED FILING RECEIPT

Continuity, Priority Claims, Petitions, and Non-Publication Requests

In response to your request for a corrected Filing Receipt, the Office is unable to comply with your request because:

- To correct or update the benefit claim of a U.S. prior-filed application, applicant must submit a corrected application data sheet (ADS) with the desired benefit claim. If a corrected ADS is submitted, any deletions should be shown with strikethrough and any additions should be shown with underlining. A domestic benefit claim that is presented after the time period set forth in 37 CFR 1.78 must be accompanied by a petition under 37 CFR 1.78. Note that once a benefit claim is deleted, applicant will not be able to claim such prior-filed application again, if the above-identified application was filed on or after November 29, 2000.

/byemane/

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Missing Parts
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

REQUEST FOR A CORRECTED FILING RECEIPT

Madam:

Applicants filed the above-identified application on September 28, 2011. On December 14, 2011, Applicants submitted a preliminary amendment amending the priority claim in the application. Because Applicants filed the preliminary amendment within four months of the application's filing date, Applicants timely submitted the priority claim. 37 C.F.R. § 1.78(a)(2)(ii).

Furthermore, the priority claim in the preliminary amendment meets the requirements of 37 C.F.R. § 1.78(a)(2)(i) because it identifies, in the first sentence of paragraph [0001], by application number and filing date, the nonprovisional applications of which the benefit is claimed, and it indicates that the above-identified application is a continuation-in-part (CIP) of each of the listed applications. Likewise, the priority claim meets the requirements of 37 C.F.R. § 1.78(a)(5)(ii) because it identifies, also in paragraph [0001], by provisional application number, the co-pending provisional applications of which the benefit is directly claimed by the above-identified application. Finally, paragraph [0002] lists additional expired provisional applications of which the benefit is indirectly claimed through various of the co-pending nonprovisional applications listed in paragraph [0001].

The filing receipt mailed on December 27, 2011, however, does not accurately reflect the information Applicants submitted in the preliminary amendment. The filing receipt provides an incomplete benefit claim because it lists only some of the applications listed in Applicants' priority claim (*i.e.*, the filing receipts list only six of the thirty-four nonprovisional applications provided in paragraph [0001], of which the application is a CIP, and it does not include the information from paragraph [0002x] and thus fails to capture several of the provisional applications of which the benefit is claimed through intermediate applications).

The above-identified application has been allowed. Applicants therefore request a corrected filing receipt to verify that the Office has recognized Applicants' priority claim, and to ensure that the face of the printed patent reflects the priority claim that Applicants timely submitted in the preliminary amendment.

Enclosed are copies of (1) the official filing receipt dated December 27, 2011, and (2) the preliminary amendment filed by Applicants on December 14, 2011, which sets forth the priority claim.

Please make the corrections to the filing receipt by adding the text set forth below in boldface underline to the "Domestic Priority data as claimed by applicant" section of the filing receipt and reprint a corrected filing receipt for the application. To improve readability, Applicants have inserted extra line breaks. Applicants have also indicated below the applications that have now issued as patents or have been abandoned.

-- Domestic Priority data as claimed by applicant

This application is a CIP of 12/380,757 03/02/2009 **PAT 8326958**
and is a CIP of 12/380,759 03/02/2009 PAT 8270310
and is a CIP of 12/380,779 03/02/2009
and is a CIP of 12/380,758 03/02/2009
and is a CIP of 12/380,778 03/02/2009 PAT 8321526
and is a CIP of 12/380,768 03/02/2009
and is a CIP of 12/380,767 03/02/2009 PAT 8355337
and is a CIP of 12/380,780 03/02/2009
and is a CIP of 12/380,755 03/02/2009 PAT 8331901
and is a CIP of 12/380,756 03/02/2009 PAT 8250207
and is a CIP of 12/380,770 03/02/2009 ABN
and is a CIP of 12/380,771 03/02/2009 PAT 8023425
and is a CIP of 12/380,772 03/02/2009

and is a CIP of 12/380,782 03/02/2009 PAT 8270952
and is a CIP of 12/380,783 03/02/2009
and is a CIP of 12/380,781 03/02/2009 PAT 8229812
and is a CIP of 12/380,774 03/02/2009
and is a CIP of 12/380,773 03/02/2009
and is a CIP of 12/380,769 03/02/2009
and is a CIP of 12/380,777 03/02/2009
and is a CIP of 12/695,019 01/27/2010 PAT 8275830
and is a CIP of 12/695,020 01/27/2010 PAT 8406748
and is a CIP of 12/694,445 01/27/2010 PAT 8391834
and is a CIP of 12/694,451 01/27/2010
and is a CIP of 12/694,455 01/27/2010 PAT 8402111
and is a CIP of 12/695,021 01/27/2010 PAT 8346225
and is a CIP of 12/695,980 01/28/2010 PAT 8340634
and is a CIP of 13/134,005 05/25/2011
and is a CIP of 13/134,028 05/25/2011
and is a CIP of 13/229,580 09/09/2011
and is a CIP of 13/237,827 09/20/2011
and is a CIP of 13/239,321 09/21/2011
and is a CIP of 13/247,998 09/28/2011
and is a CIP of 13/248,025 09/28/2011
and claims benefit of 61/387,243 09/28/2010
and claims benefit of 61/387,247 09/28/2010
and claims benefit of 61/389,547 10/04/2010
and claims benefit of 61/407,358 10/27/2010
and claims benefit of 61/418,507 12/01/2010
and claims benefit of 61/418,509 12/02/2010
and claims benefit of 61/420,727 12/07/2010
and claims benefit of 61/422,565 12/13/2010
and claims benefit of 61/422,572 12/13/2010
and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

and said 12/380,759 03/02/2009 PAT 8270310
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,779 03/02/2009
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,758 03/02/2009
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and claims benefit of 61/207,739 02/13/2009

and said 12/380,778 03/02/2009 PAT 8321526
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
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and claims benefit of 61/207,739 02/13/2009

and said 12/380,768 03/02/2009
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and said 12/380,767 03/02/2009 PAT 8355337
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and claims benefit of 61/207,393 02/10/2009
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and claims benefit of 61/206,944 02/04/2009
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and claims benefit of 61/207,739 02/13/2009

and said 12/380,782 03/02/2009 PAT 8270952
claims benefit of 61/206,354 01/28/2009
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and claims benefit of 61/207,739 02/13/2009

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and claims benefit of 61/206,944 02/04/2009
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and claims benefit of 61/207,739 02/13/2009

and said 12/380,757 03/02/2009 PAT 8326958
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,781 03/02/2009 PAT 8229812
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,774 03/02/2009
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and claims benefit of 61/207,739 02/13/2009

and said 12/380,771 03/02/2009 PAT 8023425
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and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,773 03/02/2009
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and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/380,777 03/02/2009
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and said 12/695,019 01/27/2010 PAT 8275830
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/270,353 07/06/2009
and claims benefit of 61/264,126 11/24/2009

and said 12/695,020 01/27/2010 PAT 8406748
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/275,208 08/25/2009
and claims benefit of 61/237,753 08/28/2009

and said 12/694,445 01/27/2010 PAT 8391834
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/252,151 10/15/2009

and said 12/694,451 01/27/2010
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/270,353 07/06/2009
and claims benefit of 61/252,153 10/15/2009

and said 12/694,455 01/27/2010 PAT 8402111
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009

and claims benefit of 61/264,120 11/24/2009

and said 12/695,021 01/27/2010 PAT 8346225
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/252,151 10/15/2009
and claims benefit of 61/252,153 10/15/2009

and said 12/695,980 01/28/2010 PAT 8340634
claims benefit of 61/206,354 01/28/2009
and claims benefit of 61/206,944 02/04/2009
and claims benefit of 61/207,393 02/10/2009
and claims benefit of 61/207,739 02/13/2009
and claims benefit of 61/270,353 07/06/2009

and said 13/134,005 05/25/2011
claims benefit of 61/348,022 05/25/2010

and said 13/134,028 05/25/2011
claims benefit of 61/348,022 05/25/2010

and said 13/229,580 09/09/2011
claims benefit of 61/381,159 09/09/2010
and claims benefit of 61/381,162 09/09/2010

and said 13/237,827 09/20/2011
claims benefit of 61/384,456 09/20/2010

and said 13/239,321 09/21/2011
claims benefit of 61/385,020 09/21/2010 --

CONCLUSION

Applicants are herein requesting a corrected filing receipt that reflects the priority claim that was timely submitted in the application.

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: July 10, 2013 By: _____

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: July 10, 2013 By: _____
Ann Taylor

UNITED STATES PATENT AND TRADEMARK OFFICE

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United States Patent and Trademark Office
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APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY.DOCKET.NO	TOT CLAIMS	IND CLAIMS
13/248,028	09/28/2011	2447	870	26WV-160514 [RALEP037]	25	4

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

UPDATED FILING RECEIPT



Date Mailed: 12/27/2011

Receipt is acknowledged of this non-provisional patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please submit a written request for a Filing Receipt Correction. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections**

Applicant(s)

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

Power of Attorney: None

Domestic Priority data as claimed by applicant

This application is a CIP of 12/380,757 03/02/2009
and is a CIP of 13/134,005 05/25/2011
and is a CIP of 13/134,028 05/25/2011
and is a CIP of 13/229,580 09/09/2011
and is a CIP of 13/237,827 09/20/2011
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and claims benefit of 61/387,243 09/28/2010
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and claims benefit of 61/407,358 10/27/2010
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and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

Foreign Applications (You may be eligible to benefit from the **Patent Prosecution Highway** program at the USPTO. Please see http://www.uspto.gov for more information.)

Permission to Access - A proper **Authorization to Permit Access to Application by Participating Offices** (PTO/SB/39 or its equivalent) has been received by the USPTO.

If Required, Foreign Filing License Granted: 10/14/2011

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 13/248,028**

Projected Publication Date: 04/05/2012

Non-Publication Request: No

Early Publication Request: No
**** SMALL ENTITY ****
Title

Enterprise Access Control and Accounting Allocation for Access Networks

Preliminary Class

709

PROTECTING YOUR INVENTION OUTSIDE THE UNITED STATES

Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

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LICENSE FOR FOREIGN FILING UNDER

Title 35, United States Code, Section 184

Title 37, Code of Federal Regulations, 5.11 & 5.15

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh, et al.	Not Yet Assigned
Serial No. 13/248,028	Art Unit: 2447
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

PRELIMINARY AMENDMENT

Sir:

Prior to examination of the above-referenced application, please enter the following amendments and consider the following remarks:

In the Specification:

Please replace duplicate Paragraphs [0001] through [0003] on Pages 1 through 5 of the specification with the following paragraphs [0001] through [0003]:

-- **[0001]** This application is a continuation-in-part of and incorporates by reference the following U.S. pending non-provisional patent applications: U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No.

12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,769 filed March 2, 2009, entitled "Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," U.S. serial No. 13/134,028 filed May 25, 2011, entitled "Device-Assisted Services for Protecting Network Capacity," U.S. serial No. 13/134,005 filed May 25, 2011, entitled "System and Method for Wireless Network Offloading," U.S. serial No. 13/229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces," U.S. serial No. 13/237,827 filed September 20, 2011, entitled "Adapting Network Policies Based on Device Service Processor Configuration," U.S. serial No. 13/239,321 filed September 21, 2011, entitled " Service Offer Set Publishing to Device Agent with On-Device Service Selection," U.S. serial No. 13/247,998 filed September 28, 2011, entitled "Secure Device Data Records" and U.S. serial No. 13/248,025 filed September 28, 2011, entitled "Service Design Center for Device Assisted Services." This application claims priority to and incorporates by reference the following U.S. pending provisional patent applications: U.S. provisional serial No. 61/387,243 filed September 28, 2010, entitled "Enterprise and Consumer Billing Allocation for Wireless Communication Device Service Usage Activities," U.S. provisional serial No. 61/387,247 filed September 28, 2010, entitled "Secured Device Data Records," U.S. provisional serial No. 61/389,547 filed October 4, 2010, entitled "User Notifications for Device Assisted Services," U.S. provisional serial No. 61/407,358 filed October 27, 2010, entitled "Service Controller and Service Processor Architecture," U.S. provisional serial No. 61/418,507 filed December 1, 2010, entitled "Application Service Provider Interface System," U.S. provisional serial No. 61/418,509 filed

December 1, 2010, entitled "Service Usage Reporting Reconciliation and Fraud Detection for Device Assisted Services," U.S. provisional serial No. 61/420,727 filed December 7, 2010, entitled "Secure Device Data Records," U.S. provisional serial No. 61/422,565 filed December 13, 2010, entitled "Service Design Center for Device Assisted Services," U.S. provisional serial No. 61/422,572 filed December 13, 2010, entitled "System Interfaces and Workflows for Device Assisted Services," U.S. provisional serial No. 61/422,574 filed December 13, 2010, entitled "Security and Fraud Detection for Device Assisted Services," U.S. provisional serial No. 61/435,564 filed January 24, 2011, entitled "Framework for Device Assisted Services," and U.S. provisional serial No. 61/472,606 filed April 6, 2011, entitled "Managing Service User Discovery and Service Launch Object Placement on a Device."

[0002] Further, this application incorporates by reference the following U.S. provisional patent applications: U.S. provisional serial No. 61/206,354 filed January 28, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/206,944 filed February 4, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/207,393 filed February 10, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/207,739 filed February 13, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/270,353 filed July 6, 2009, entitled "Device Assisted CDR Creation, Aggregation, Mediation and Billing," U.S. provisional serial No. 61/275,208 filed August 25, 2009, entitled "Adaptive Ambient Services," U.S. provisional serial No. 61/237,753 filed August 28, 2009, entitled "Adaptive Ambient Services," U.S. provisional serial No. 61/252,151 filed October 15, 2009, entitled "Security Techniques for Device Assisted Services," U.S. provisional serial No. 61/252,153 filed October 15, 2009, entitled "Device Group Partitions and Settlement Platform," U.S. provisional serial No. 61/264,120 filed November 24, 2009, entitled "Device Assisted Services Install," U.S. provisional serial No. 61/264,126 filed November 24, 2009, entitled "Device Assisted Services Activity Map," U.S. provisional serial No. 61/348,022 filed May 25, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional serial No. 61/381,159 filed September 9, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional serial No. 61/381,162 filed September 9, 2010, entitled "Service Controller Interfaces and Workflows," U.S. provisional serial No. 61/384,456 filed

September 20, 2010, entitled "Securing Service Processor with Sponsored SIMs," U.S. provisional serial No. 61/385,020 filed September 21, 2010, entitled "Service Usage Reconciliation System Overview." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S.

serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy" claim priority to U.S. provisional serial No. 61/206,354 filed January 28, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central

Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy" claim priority to U.S. provisional serial No. 61/206,944 filed February 4, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device

Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/207,393 filed February 10, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with

Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial

No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/207,739 filed February 13, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/270,353 filed July 6, 2009, entitled "Device Assisted CDR Creation, Aggregation, Mediation and Billing." The following application, U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," claims priority to U.S. provisional serial No. 61/275,208 filed August 25, 2009, entitled "Adaptive Ambient Services." The following application, U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," claims priority to U.S. provisional serial No. 61/237,753 filed August 28, 2009, entitled "Adaptive Ambient Services." The following applications, U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/695,021 filed January 27, 2010 entitled "Quality of Service for Device Assisted Services" claim priority to U.S. provisional serial No. 61/252,151 filed October 15, 2009, entitled "Security Techniques for Device Assisted Services." The following applications, U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services" claim priority to U.S. provisional serial No. 61/252,153 filed October 15, 2009, entitled "Device Group Partitions and Settlement Platform." The following application, U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install" claims priority to U.S. provisional serial No. 61/264,120 filed November 24, 2009, entitled "Device Assisted Services Install." The following application, U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing" claims priority to U.S. provisional serial No. 61/264,126 filed November 24, 2009, entitled "Device Assisted Services Activity Map." The following applications, U.S. serial No. 13/134,028 filed May 25, 2011, entitled "Device-Assisted Services for Protecting Network Capacity" and U.S. serial No. 13/134,005 filed May 25, 2011, entitled

"System and Method for Wireless Network Offloading" claim priority to U.S. provisional serial No. 61/348,022 filed May 25, 2010, entitled "Device Assisted Services for Protecting Network Capacity." The following application, U.S. serial No. 13,229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces" claims priority to U.S. provisional serial No. 61/381,159 filed September 9, 2010, entitled "Device Assisted Services for Protecting Network Capacity." The following application, U.S. serial No. 13,229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces" claims priority to U.S. provisional serial No. 61/381,162 filed September 9, 2010, entitled "Service Controller Interfaces and Workflows." The following application, U.S. serial No. 13/237,827 filed September 20, 2011, entitled "Adapting Network Policies Based on Device Service Processor Configuration" claims priority to U.S. provisional serial No. 61/384,456 filed September 20, 2010, entitled "Securing Service Processor with Sponsored SIMs." The following application, U.S. serial No. 13/239,321 filed September 21, 2011, entitled "Service Office Set Publishing to Device Agent with On-Device Service Selection" claims priority to U.S. provisional serial No. 61/385,020 filed September 21, 2010, entitled "Service Usage Reconciliation System Overview."

[0003] All of the above patents and applications are hereby incorporated by reference. --

REMARKS

Applicants respectfully request entry of the preliminary amendment set forth in this paper. Duplicate Paragraphs [0001] through [0003] of the specification are being replaced herein.

The undersigned authorizes any fees which may be required, or credit any overpayment to Deposit Account No. 50-4561. Should the Examiner have any questions or need any additional information regarding this communication, the Examiner is invited to contact the undersigned at the telephone number shown below.

Respectfully submitted,

Date: December 14, 2011 By: _____

Marc A. Sockol
Reg. No. 40,823
Customer Number 69849
Sheppard Mullin Richter & Hampton LLP
379 Lytton Avenue
Palo Alto, CA 94301-1432
Telephone: (650) 815-2600

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: December 14, 2011 By: Linda K. Brost
Linda K. Brost

Electronic Acknowledgement Receipt

EFS ID:	16282825
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	10-JUL-2013
Filing Date:	28-SEP-2011
Time Stamp:	20:56:05
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Request for Corrected Filing Receipt	P037ReqCorrectFilingReceipt.pdf	1076035 3c04708105d06b769bb34b4675f05ca17962234e	no	23
Warnings:					
Information:					

Total Files Size (in bytes):	1076035

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	7457265		2008-11-25	Julka, Vibhor et al.	
	2	7729326		2010-06-01	Sekhar, Ramesh	
	3	7929973		2011-04-19	Zavalkovsky, Arthur et al.	
	4	7945945		2011-05-17	Graham, Richard et al.	
	5	8059530		2011-11-15	Cole, Terry L.	
	6	8266681		2012-09-11	Deshpande, Sumit B. et al.	
	7	8280354		2012-10-02	Smith, Christopher et al.	
	8	8331293		2012-12-11	Sood, Kapil	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7545782		2009-06-09	Rayment, Stephen G. et al.	
	10	7039037		2006-05-02	Wang, Jiwei R. et al.	
	11	6928280		2005-08-09	Xanthos, James et al.	
	12	6765925		2004-07-20	Sawyer, Wilson et al.	
	13	5889477		1999-03-30	Fastenrath, Ulrich	
	14	8347362		2013-01-01	Cai, Yigang et al.	
	15	8315718		2012-11-20	Caffrey, Paul Oliver et al.	
	16	8332517		2012-12-11	Russell, Jesse E.	
	17	8005009		2011-08-23	McKee, Neil et al.	
	18	7760861		2010-07-20	Croak, Marian et al.	
	19	8060463		2011-11-15	Spiegel, Joel R.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8224773		2012-07-17	Spiegel, Joel R.	
	21	8352980		2013-01-08	Howcroft, Jerald Robert	
	22	8386386		2013-02-26	Zhu, Kevin	
	23	8340718		2012-12-25	Colonna, Massimo et al.	
	24	8385896		2013-02-26	Proctor, Jr., James A. et al.	
	25	8320949		2012-11-27	Matta, Sudheer Poorna Chandra	
	26	8279864		2012-10-02	Wood, Daniel M.	
	27	8271045		2012-09-18	Parolkar, Satish et al.	
	28	8233883		2012-07-31	De Froment, Eric	
	29	8224382		2012-07-17	Bultman, Michael J.	
	30	8184590		2012-05-22	Rosenblatt, Ariel	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	31	8174970		2012-05-08	Adamczyk, Maria et al.	
	32	8165576		2012-04-24	Raju, Vishwanath et al.	
	33	8073721		2011-12-06	Lewis, Lundy	
	34	8032899		2011-10-04	Archer, Charles J. et al.	
	35	7974624		2011-07-05	Gallagher, Michael D. et al.	
	36	7907970		2011-03-15	Park, Vincent D. et al.	
	37	7778176		2010-08-17	Morford, Michael Robert|	
	38	7725570		2010-05-25	Lewis, Lundy	
	39	7634388		2009-12-15	Archer, Charles J. et al.	
	40	7633438		2009-12-15	Tysowski, Piotr Konrad	
	41	7593417		2009-09-22	Wang, James et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	42	7551922		2009-06-23	Roskowski, Steve et al.	

If you wish to add additional U.S. Patent citation information please click the Add button.

U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20080120668		2008-05-22	Yau, Frank Chuen-Foo	
	2	20030171112		2003-09-11	Lupper, Alfred et al.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	1889777A	CN		2006-07-19	Huawei Tech. Co. Ltd.		☐
	2	101155343A	CN		2006-09-29	Huawei Tech. Co. Ltd.		☐
	3	101035308A	CN		2006-03-09	Huawei Tech. Co. Ltd.		☐
	4	2007124279	WO		2007-11-01	Cisco Technology, Inc.		☐

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NON-PATENT LITERATURE DOCUMENTS

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☒ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

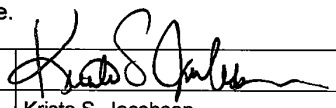
☐ See attached certification statement.

☒ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-06-27
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Large Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
Submission- Information Disclosure Stmt	1806	1	180	180
		Total in USD ($)		**180**

Electronic Acknowledgement Receipt	
EFS ID:	16179417
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	27-JUN-2013
Filing Date:	28-SEP-2011
Time Stamp:	18:45:00
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$180
RAM confirmation Number	6688
Deposit Account	505876
Authorized User	
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.16 (National application filing, search, and examination fees) Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees)	

Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees) Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees) Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)	

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Transmittal Letter	P037Ltr.pdf	339532 d84a6bbfd03c0d84e032f49006cb7e3ca0794165	no	2
Warnings:					
Information:					
2	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	1325269 81a4f157149cbeb0ebf539dfea83d3d0b296c2d6	no	7
Warnings:					
Information:					
This is not an USPTO supplied IDS fillable form					
3	Foreign Reference	Huawei1.pdf	928344 9a22716535cc0ec62b3db71f323c7634d266e61a	no	19
Warnings:					
Information:					
4	Foreign Reference	Huawei2.pdf	2070647 cc7a6c8344a80e179d9f2601a49cb9a37f359e87	no	28
Warnings:					
Information:					
5	Foreign Reference	Huawei3.pdf	1231903 bb1b6fa1721a042823731a8283b8d37b6b313b35	no	28
Warnings:					
Information:					
6	Foreign Reference	Cisco.pdf	1398028 a85c7e6d6f08a1f6747fb7d21a9fb93427e3c5e3	no	69
Warnings:					
Information:					
7	Fee Worksheet (SB06)	fee-info.pdf	30479 facb11f4775a8fc2bf9a8cb3a6d5761c5eb507e8	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	7324202		

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh	Andrew J. Rudy
Serial No. 13/248,028	Art Unit: 3687
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Mail Stop Petitions
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

SUBMISSION OF INFORMATION DISCLOSURE STATEMENT AFTER RECEIPT OF NOTICE OF ALLOWANCE BUT PRIOR TO PAYMENT OF ISSUE FEE

Madam:

In accordance with the duty of disclosure under 37 CFR §1.56 and pursuant to 37 CFR §§ 1.97-1.98, Applicant hereby submits the references listed on the enclosed Form PTO-SB/08A.

The present Information Disclosure Statement is being filed after Applicant received the Notice of Allowance in the above-captioned application, but before Applicant has paid the Issue Fee. Accordingly, pursuant to 37 C.F.R. § 1.97(d), Applicant is submitting both the fee set forth in 37 C.F.R. § 1.17(p) and the certification statement set forth in 37 C.F.R. § 1.97(e).

Applicant respectfully requests consideration of the listed references.

CONCLUSION

Applicant respectfully requests that the Examiner consider the references listed in the IDS submitted herewith. In accordance with 37 C.F.R. § 1.97(d)-(e), the IDS is being filed prior to payment of the issue fee, with both the certification statement and fee specified in 37 C.F.R. § 1.97(d)-(e).

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: June 27, 2013

By: _____

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: June 27, 2013 By: _____
Ann Taylor

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
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NOTICE OF ALLOWANCE AND FEE(S) DUE

107265 7590 06/14/2013
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	
ART UNIT	PAPER NUMBER
3687	

DATE MAILED: 06/14/2013

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$890	$300	$0	$1190	09/16/2013

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the ENTITY STATUS shown above. If the ENTITY STATUS is shown as SMALL or MICRO, verify whether entitlement to that entity status still applies.

If the ENTITY STATUS is the same as shown above, pay the TOTAL FEE(S) DUE shown above.

If the ENTITY STATUS is changed from that shown above, on PART B - FEE(S) TRANSMITTAL, complete section number 5 titled "Change in Entity Status (from status indicated above)".

For purposes of this notice, small entity fees are 1/2 the amount of undiscounted fees, and micro entity fees are 1/2 the amount of small entity fees.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

107265 7590 06/14/2013
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission
I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

(Depositor's name)
(Signature)
(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

TITLE OF INVENTION: ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	SMALL	$890	$300	$0	$1190	09/16/2013

EXAMINER	ART UNIT	CLASS-SUBCLASS
RUDY, ANDREW J	3687	705-032000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).
- ❑ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
- ❑ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list
(1) the names of up to 3 registered patent attorneys or agents OR, alternatively,
(2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.
1 _____
2 _____
3 _____

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE (B) RESIDENCE: (CITY and STATE OR COUNTRY)

Please check the appropriate assignee category or categories (will not be printed on the patent) : ❑ Individual ❑ Corporation or other private group entity ❑ Government

4a. The following fee(s) are submitted:
- ❑ Issue Fee
- ❑ Publication Fee (No small entity discount permitted)
- ❑ Advance Order - # of Copies _____

4b. Payment of Fee(s): **(Please first reapply any previously paid issue fee shown above)**
- ❑ A check is enclosed.
- ❑ Payment by credit card. Form PTO-2038 is attached.
- ❑ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment, to Deposit Account Number _____ (enclose an extra copy of this form).

5. **Change in Entity Status** (from status indicated above)

❑ Applicant certifying micro entity status. See 37 CFR 1.29

NOTE: Absent a valid certification of Micro Entity Status (see form PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.

❑ Applicant asserting small entity status. See 37 CFR 1.27

NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.

❑ Applicant changing to regular undiscounted fee status.

NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: The Issue Fee and Publication Fee (if required) will not be accepted from anyone other than the applicant; a registered attorney or agent; or the assignee or other party in interest as shown by the records of the United States Patent and Trademark Office.

Authorized Signature _____ Date _____

Typed or printed name _____ Registration No. _____

This collection of information is required by 37 CFR 1.311. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, Virginia 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

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UNITED STATES DEPARTMENT OF COMMERCE
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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 06/14/2013

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	

ART UNIT	PAPER NUMBER
3687	

DATE MAILED: 06/14/2013

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)
(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 0 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 0 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether disclosure of these records is required by the Freedom of Information Act.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspection or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Notice of Allowability	Application No. 13/248,028	Applicant(s) RALEIGH ET AL.	
	Examiner ANDREW JOSEPH RUDY	Art Unit 3687	AIA (First Inventor to File) Status No

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *02 April 2013 Amendment*.
   ☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were filed on_____.
2. ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.
3. ☐ The allowed claim(s) is/are _____. As a result of the allowed claim(s), you may be eligible to benefit from the **Patent Prosecution Highway** program at a participating intellectual property office for the corresponding application. For more information, please see http://www.uspto.gov/patents/init_events/pph/index.jsp or send an inquiry to PPHfeedback@uspto.gov .
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

   Certified copies:

   a) ☐ All b) ☐ Some *c) ☐ None of the:
   1. ☐ Certified copies of the priority documents have been received.
   2. ☐ Certified copies of the priority documents have been received in Application No. _____ .
   3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

   * Certified copies not received: _____.

   Interim copies:

   a) ☐ All b) ☐ Some c) ☐ None of the: Interim copies of the priority documents have been received.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
   ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

   Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☒ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date _____
3. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
4. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____ .
5. ☒ Examiner's Amendment/Comment
6. ☒ Examiner's Statement of Reasons for Allowance
7. ☐ Other _____.

DETAILED ACTION

1. Claims 18-25 have been cancelled by the Applicant.

2. Further pertinent references of interest are noted on the attached PTO-892.

3. Applicant's Information Disclosure Statements (IDS's) submitted January 22, 2013; March 22, 2013 and May 23, 2013 have been reviewed. Note the attached IDS's.

Allowable Subject Matter

4. Pursuant to Applicant's April 2, 2013 Amendment and REMARKS, claims 1-7 and 26-55 are allowed.

The following is an examiner's statement of reasons for allowance: The prior art of record, either alone or in combination, does not disclose, or suggest, Applicant's claim language.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW JOSEPH RUDY whose telephone number is (571)272-6789. The examiner can normally be reached on Monday thru Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew S. Gart can be reached on 571-272-3955. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ANDREW JOSEPH RUDY/

Primary Examiner, Art Unit 3687

Notice of References Cited	Application/Control No. 13/248,028	Applicant(s)/Patent Under Reexamination RALEIGH ET AL.	
	Examiner ANDREW JOSEPH RUDY	Art Unit 3687	Page 1 of 1

U.S. PATENT DOCUMENTS

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Name	Classification
*	A	US-8,447,324	05-2013	Shuman et al.	455/456.1
*	B	US-8,191,116	05-2012	Gazzard, Daryl	726/4
*	C	US-8,155,155	04-2012	Chow et al.	370/485
*	D	US-8,019,820	09-2011	Son et al.	709/206
*	E	US-7,944,948	05-2011	Chow et al.	370/485
*	F	US-7,802,724	09-2010	Nohr, Steven Paul	235/384
*	G	US-7,472,189	12-2008	Mallya et al.	709/224
*	H	US-7,043,226	05-2006	Yamauchi, Toshiaki	455/405
*	I	US-6,292,828	09-2001	Williams, David L.	709/218
	J	US-			
	K	US-			
	L	US-			
	M	US-			

FOREIGN PATENT DOCUMENTS

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Country	Name	Classification
	N					
	O					
	P					
	Q					
	R					
	S					
	T					

NON-PATENT DOCUMENTS

*		Include as applicable: Author, Title Date, Publisher, Edition or Volume, Pertinent Pages)
	U	
	V	
	W	
	X	

*A copy of this reference is not being furnished with this Office action. (See MPEP § 707.05(a).)
Dates in MM-YYYY format are publication dates. Classifications may be US or foreign.

Issue Classification	Application/Control No.	Applicant(s)/Patent under Reexamination	
	13/248,028	RALEIGH ET AL.	
	Examiner	Art Unit	
	ANDREW JOSEPH RUDY	3687	

ISSUE CLASSIFICATION

ORIGINAL						CROSS REFERENCE(S)							
CLASS				SUBCLASS	CLASS	SUBCLASS (ONE SUBCLASS PER BLOCK)							
709				203	709	224							
INTERNATIONAL CLASSIFICATION					455	406							
G	0	6	F	15/173									
				/									
				/									
				/									
				/									

XXXXXXXXXXXXXXXXXX (Assistant Examiner) (Date)	/Andrew Joseph Rudy/ 6/3/2013 (Primary Examiner) (Date)	Total Claims Allowed: 47
(Legal Instruments Examiner) (Date)		O.G. Print Claim(s): 1 / O.G. Print Fig.: 1

☐ Claims renumbered in the same order as presented by applicant ☐ CPA ☐ T.D. ☐ R.1.47

Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original
1	1	31	31		61		91		121		151		181
2	2	32	32		62		92		122		152		182
3	3	33	33		63		93		123		153		183
4	4	34	34		64		94		124		154		184
5	5	35	35		65		95		125		155		185
6	6	36	36		66		96		126		156		186
7	7	37	37		67		97		127		157		187
8	8	38	38		68		98		128		158		188
9	9	39	39		69		99		129		159		189
10	10	40	40		70		100		130		160		190
11	11	41	41		71		101		131		161		191
12	12	42	42		72		102		132		162		192
13	13	43	43		73		103		133		163		193
14	14	44	44		74		104		134		164		194
15	15	45	45		75		105		135		165		195
16	16	46	46		76		106		136		166		196
17	17	47	47		77		107		137		167		197
	18	18	48		78		108		138		168		198
	19	19	49		79		109		139		169		199
	20	20	50		80		110		140		170		200
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	23	23	53		83		113		143		173		203
	24	24	54		84		114		144		174		204
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27	27		57		87		117		147		177		207
28	28		58		88		118		148		178		208
29	29		59		89		119		149		179		209
30	30		60		90		120		150		180		210

Search Notes

Application/Control No.	Applicant(s)/Patent under Reexamination	
13/248,028	RALEIGH ET AL.	
Examiner	**Art Unit**	
ANDREW JOSEPH RUDY	3687	

SEARCHED			
Class	Subclass	Date	Examiner
709	203,216, 219,223, 224,225	6/3/2013	AJR
709	226,238	6/3/2013	AJR
370	230,289	6/3/2013	AJR
726	1,4	6/3/2013	AJR
455	30,34	6/3/2013	AJR
455	404.1	6/3/2013	AJR
455	405,406	6/3/2013	AJR
455	414.1	6/3/2013	AJR
455	456.1	6/3/2013	AJR

INTERFERENCE SEARCHED			
Class	Subclass	Date	Examiner
709	**203,224**	**6/3/2013**	**AJR**
455	406	6/3/2013	AJR

SEARCH NOTES (INCLUDING SEARCH STRATEGY)		
	DATE	EXMR
Continuity data reviewed.	6/3/2013	AJR
Inventor name search conducted.	6/3/2013	AJR
Bibliographic data sheet reviewed.	6/3/2013	AJR

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6754470		2004-06-22	Hendrickson, Keith et al.	
	2	8122128		2012-02-21	Burke, II, Robert M. et al.	
	3	8149823		2012-04-03	Turcan, Diane Brown et al.	
	4	8131256		2012-03-06	Martti, Jyrki et al.	
	5	6381316		2002-04-30	Joyce, Simon James et al.	
	6	7965983		2011-06-21	Swan, Tim et al.	
	7	8284740		2012-10-09	O'Connor, Dennis M.	
	8	8116223		2012-02-14	Tian, Dan et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	6154738		2000-11-28	Call, Charles Gainor	
	10	8423016		2013-04-16	Buckley, Adrian et al.	
	11	8306518		2012-11-06	Gailloux, Michael A.	
	12	8422988		2013-04-16	Keshav, Srinivasan	
	13	8326359		2012-12-04	Kauffman, Donald C.	
	14	6035281		2000-03-07	Crosskey, James P. et al.	
	15	6996393		2006-02-07	Pyhalammi, Seppo et al.	
	16	7760711		2010-07-20	Kung, Fen-Chung et al.	
	17	8000318		2011-08-16	Wiley, William L. et al.	
	18	8098579		2012-01-17	Ray, Amar N. et al.	
	19	8155670		2012-04-10	Fullam, Scott et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8374090		2013-02-12	Morrill, Robert J. et al.	

If you wish to add additional U.S. Patent citation information please click the Add button.

U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20110173678		2011-07-14	Kaippallimalil, John et al.	
	2	20080235511		2008-09-25	O'Brien, William G. et al.	
	3	20080240373		2008-10-02	Wilhelm, Robert D.	
	4	20100027559		2010-02-04	LIN, Hung-Ming et al.	
	5	20020116338		2002-08-22	Gonthier, Jean-Charles et al.	
	6	20070061878		2007-03-15	Hagiu, Costin et al.	
	7	20100020822		2010-01-28	Zerillo, Anthony J. et al.	
	8	20040203755		2004-10-14	Brunet, Jeffrey et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	20090172077		2009-07-02	Roxburgh, David et al.	
	10	20080051076		2008-02-28	O'Shaughnessy, John et al.	
	11	20080313730		2008-12-18	Iftimie, Sorin et al.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	2006120558A1	WO		2006-11-16	Nokia Corp.		☐

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NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	Search Report and Written Opinion mailed 30 January 2012 from International Serial Number PCT/US2011/053797 filed 28 September 2011 [RALEP037]	☐

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EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	06/03/2013

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

EFS Web 2.1.17

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

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U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8291238		2012-10-16	Ginter, Karl L. et al.	
	2	8068824		2011-11-29	Shan, Xueshan et al.	
	3	7228354		2007-06-05	Chambliss, David Darden et al.	
	4	5283904		1994-02-01	Carson, David G. et al.	
	5	8208919		2012-06-26	Kotecha, Lalit Ratilal	
	6	8185152		2012-05-22	Goldner, Alla	
	7	7844728		2010-11-30	Anderson, Thomas W. et al.	
	8	8094551		2012-01-10	Huber, Kurt Donald et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7970350		2011-06-28	Sheynman, Arnold et al.	
	10	7948952		2011-05-24	Hurtta, Tuija et al.	
	11	7957020		2011-06-07	Mine, Ryuta et al.	
	12	7346410		2008-03-18	Uchiyama, Kenji	
	13	7167078		2007-01-23	Pourchot, Shawn C.	
	14	8102814		2012-01-24	Rahman, Shahriar I. et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20090307746		2009-12-10	DI, Jinwen et al.	
	2	20050009499		2005-01-13	Koster, Karl	
	3	20100041364		2010-02-18	Lott, Robert Wayne et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	4	20100027469		2010-02-04	Gurajala, Ravindra Babu et al.	
	5	20010053694		2001-12-20	Igarashi, Yoichiro et al.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1							☐

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NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	06/03/2013

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8135388		2012-03-13	Gailloux, Michael A. et al.	
	2	6947723		2005-09-20	Gurnani, Roger et al.	
	3	8350700		2013-01-08	Fast, Raymond D. et al.	
	4	8204190		2012-06-19	Bang, Jung-Hee et al.	
	5	7962622		2011-06-14	Friend, John et al.	
	6	7583964		2009-09-01	Wong, Gregory A.	
	7	7565141		2009-07-21	Macaluso, Anthony G.	
	8	7373179		2008-05-13	Stine, Ted et al.	

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	9	7236780		2007-06-26	Benco, David S. et al.	
	10	7039403		2006-05-02	Wong, Gregory A.	
	11	7865182		2011-01-04	Macaluso, Anthony G.	
	12	8370477		2013-02-05	Short, Joel E. et al.	
	13	8364806		2013-01-29	Short, Joel E. et al.	
	14	8279067		2012-10-02	Berger, Thomas R. et al.	
	15	8213296		2012-07-03	Shannon, Frank M. et al.	
	16	8019868		2011-09-13	Rao, Goutham et al.	
	17	8005988		2011-08-23	Maes, Stephane H.	
	18	7978627		2011-07-12	Taylor, William Scott et al.	
	19	7711848		2010-05-04	Maes, Stephane H.	

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	Attorney Docket Number	RALEP037

	20	6782412		2004-08-24	Brophy, Kevin et al.	
	21	6081591		2000-06-27	Skoog, Frederick H.	
	22	6064878		2000-05-16	Denker, John Stewart et al.	
	23	7730123		2010-06-01	Erickson, Richard R. et al.	
	24	8024397		2011-09-20	Erickson, Richard R. et al.	
	25	8156206		2012-04-10	Kiley, Kevin J. et al.	
	26	8126722		2012-02-28	Robb, Terence Alan et al.	
	27	8315594		2012-11-20	MAUSER, Edward Ronald et al.	
	28	8353001		2013-01-08	HERROD, Allan	
	29	8195093		2013-06-05	GARRETT, Darrin et al.	
	30	8036600		2011-10-11	GARRETT, Darrin et al.	

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	Attorney Docket Number	RALEP037

	31	8364089		2013-01-29	PHILLIPS, Derek	
	32	8335161		2012-12-18	FOOTTIT, Tom et al.	
	33	8301513		2012-10-30	PENG, Shih-Ta et al.	
	34	8230061		2012-07-24	HASSAN, Amer A. et al.	
	35	8204794		2012-06-19	PENG, Shih-Ta et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20090299857		2009-12-03	Brubaker, Curtis M.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1							☐

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	1		☐

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EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	06/03/2013

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PTO/SB/08a (01-10)
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U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6754470		2004-06-22	Hendrickson, Keith et al.	
	2	8122128		2012-02-21	Burke, II, Robert M. et al.	
	3	8149823		2012-04-03	Turcan, Diane Brown et al.	
	4	8131256		2012-03-06	Martti, Jyrki et al.	
	5	6381316		2002-04-30	Joyce, Simon James et al.	
	6	7965983		2011-06-21	Swan, Tim et al.	
	7	8284740		2012-10-09	O'Connor, Dennis M.	
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	9	6154738		2000-11-28	Call, Charles Gainor	
	10	8423016		2013-04-16	Buckley, Adrian et al.	
	11	8306518		2012-11-06	Gailloux, Michael A.	
	12	8422988		2013-04-16	Keshav, Srinivasan	
	13	8326359		2012-12-04	Kauffman, Donald C.	
	14	6035281		2000-03-07	Crosskey, James P. et al.	
	15	6996393		2006-02-07	Pyhalammi, Seppo et al.	
	16	7760711		2010-07-20	Kung, Fen-Chung et al.	
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	19	8155670		2012-04-10	Fullam, Scott et al.	

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	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8374090		2013-02-12	Morrill, Robert J. et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20110173678		2011-07-14	Kaippallimalil, John et al.	
	2	20080235511		2008-09-25	O'Brien, William G. et al.	
	3	20080240373		2008-10-02	Wilhelm, Robert D.	
	4	20100027559		2010-02-04	LIN, Hung-Ming et al.	
	5	20020116338		2002-08-22	Gonthier, Jean-Charles et al.	
	6	20070061878		2007-03-15	Hagiu, Costin et al.	
	7	20100020822		2010-01-28	Zerillo, Anthony J. et al.	
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	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	20090172077		2009-07-02	Roxburgh, David et al.	
	10	20080051076		2008-02-28	O'Shaughnessy, John et al.	
	11	20080313730		2008-12-18	Iftimie, Sorin et al.	

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FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1	2006120558A1	WO		2006-11-16	Nokia Corp.		☐

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NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1	Search Report and Written Opinion mailed 30 January 2012 from International Serial Number PCT/US2011/053797 filed 28 September 2011 [RALEP037]	☐

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EXAMINER SIGNATURE

Examiner Signature		Date Considered	

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	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

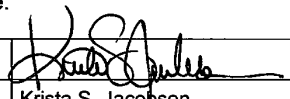
☐ See attached certification statement.

☒ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-05-23
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

PATENT COOPERATION TREATY

PCT

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY
(Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44*bis*)

Applicant's or agent's file reference 26WV-160514	**FOR FURTHER ACTION**	See item 4 below
International application No. PCT/US2011/053797	International filing date *(day/month/year)* 29 September 2011 (29.09.2011)	Priority date *(day/month/year)* 28 September 2010 (28.09.2010)
International Patent Classification (8th edition unless older edition indicated) See relevant information in Form PCT/ISA/237		
Applicant HEADWATER PARTNERS I LLC		

1. This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 *bis*.1(a).

2. This REPORT consists of a total of 8 sheets, including this cover sheet.

   In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.

3. This report contains indications relating to the following items:

☒	Box No. I	Basis of the report
☐	Box No. II	Priority
☐	Box No. III	Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
☒	Box No. IV	Lack of unity of invention
☒	Box No. V	Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
☐	Box No. VI	Certain documents cited
☐	Box No. VII	Certain defects in the international application
☐	Box No. VIII	Certain observations on the international application

4. The International Bureau will communicate this report to designated Offices in accordance with Rules 44*bis*.3(c) and 93*bis*.1 but not, except where the applicant makes an express request under Article 23(2), before the expiration of 30 months from the priority date (Rule 44*bis*.2).

	Date of issuance of this report 02 April 2013 (02.04.2013)
The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland Facsimile No. +41 22 338 82 70	Authorized officer Philippe Bécamel e-mail: pt01.pct@wipo.int

Form PCT/IB/373 (January 2004)

PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

To: MARC A. SOCKOL
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
390 LYTTON AVENUE
PALO ALTO, CA 94301

PCT

WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43*bis*.1)

Date of mailing *(day/month/year)*	30 MAY 2012
Applicant's or agent's file reference: 26WV-160514	FOR FURTHER ACTION: See paragraph 3 below

International application No.	International filing date *(day/month/year)*	Priority date *(day/month/year)*
PCT/US 11/53797	28 September 2011 (28.09.2011)	28 September 2010 (28.09.2010)

International Patent Classification (IPC) or both national classification and IPC
IPC(8) - H04M 11/00 (2012.01)
USPC - 455/405

Applicant: HEADWATER PARTNERS I LLC

1. This opinion contains indications relating to the following items:

- ☒ Box No. I — Basis of the opinion
- ☐ Box No. II — Priority
- ☐ Box No. III — Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☒ Box No. IV — Lack of unity of invention
- ☒ Box No. V — Reasoned statement under Rule 43*bis*.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI — Certain documents cited
- ☐ Box No. VII — Certain defects in the international application
- ☐ Box No. VIII — Certain observations on the international application

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1 *bis*(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

Name and mailing address of the ISA/US	Date of completion of this opinion	Authorized officer:
Mail Stop PCT, Attn: ISA/US Commissioner for Patents P.O. Box 1450, Alexandria, Virginia 22313-1450 Facsimile No. 571-273-3201	23 May 2012 (23.05.2012)	Lee W. Young PCT Helpdesk: 571-272-4300 PCT OSP: 571-272-7774

Form PCT/ISA/237 (cover sheet) (July 2011)

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/53797

Box No. I Basis of this opinion

1. With regard to the **language**, this opinion has been established on the basis of:

☒ the international application in the language in which it was filed.

☐ a translation of the international application into _____ which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1(b)).

2. ☐ This opinion has been established taking into account the **rectification of an obvious mistake** authorized by or notified to this Authority under Rule 91 (Rule 43*bis*.1(a)).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, this opinion has been established on the basis of a sequence listing filed or furnished:

a. (means)

☐ on paper

☐ in electronic form

b. (time)

☐ in the international application as filed.

☐ together with the international application in electronic form.

☐ subsequently to this Authority for the purposes of search.

4. ☐ In addition, in the case that more than one version or copy of a sequence listing has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.

5. Additional comments:

Form PCT/ISA/237 (Box No. I) (July 2011)

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/53797

Box No. IV Lack of unity of invention

1. ☒ In response to the invitation (Form PCT/ISA/206) to pay additional fees the applicant has, within the applicable time limit:

☐ paid additional fees

☐ paid additional fees under protest and, where applicable, the protest fee

☐ paid additional fees under protest but the applicable protest fee was not paid

☒ not paid additional fees

2. ☐ This Authority found that the requirement of unity of invention is not complied with and chose not to invite the applicant to pay additional fees.

3. This Authority considers that the requirement of unity of invention in accordance with Rule 13.1, 13.2 and 13.3 is

☐ complied with

☒ not complied with for the following reasons:

The inventions listed as Groups 1 - 2 do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons:

The special technical feature of the Group 1 invention is directed to a a network system containing information about a network access activity of an end-user device and a first service design center for monitoring/controlling the service usage across multiple networks.

The special technical feature of the Group 2 invention is directed to a communications device that supports secure execution of an enterprise software application in a secure enterprise application execution environment and a personal application execution environment comprising memory to support execution of personal software applications not approved by the enterprise to execute in the secure enterprise application execution environment and accounted to a personal service usage allocation.

The only common technical feature shared by the above groups is a communications/end-user device that can operate across multiple networks.

The common technical feature does not represent an improvement over the prior art of US 2011/0201304 A1 to Sutaria et al. that teaches a communications/end-user device that can operate in multiple networks ("User Session Activity can include information such as when a communication session started, ended, what type of mobile device or browser was used during the session, and a session identifier. This information may be used for example, when a service provider wishes to provide a service plan based on the amount of time the mobile device 21 is connected to the enterprise network 18. The billing manager 26 or a connector (enterprise or personal client) in the enterprise network 18 may operate a timer that detects when the communication session is first initiated and when the session is terminated" see para [0044]. "the mobile device 90A may be provisioned with three different services, a first enterprise service 92A, a second email service 92B provided by an Internet Service Provider (ISP) 96, and a third email service 92C provided by an ISP 98 ", para [0056]-[0060]).

As the above technical feature of communications/end-user device that can operate in multiple networks as taught by Sutaria et al was known, this cannot be considered a special technical feature that would otherwise unify the groups.

Therefore, the inventions of Groups 1-2 lack unity of invention under PCT Rule 13 because they do not share a same or corresponding special technical feature.

4. Consequently, this opinion has been established in respect of the following parts of the international application:

☐ all parts

☒ the parts relating to claims Nos. Claims 1-22 and 24-25

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WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/53797

Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement:

Novelty (N)	Claims	1-22, 24-25	YES
	Claims	None	NO
Inventive step (IS)	Claims	None	YES
	Claims	1-22, 24-25	NO
Industrial applicability (IA)	Claims	1-22, 24-25	YES
	Claims	None	NO

2. Citations and explanations:

Claims 1-22 and 24-25 lack an inventive step under PCT Article 33(3) as being obvious over US 20030224781 A1 to Milford et al. (hereinafter Milford) in view of US 2003/0046396 A1 to Richter et al. (hereinafter Richter).

Regarding claim 1, Milford teaches a network system for providing network access service notification messages containing information about a network access activity of an end-user device (a method and structure for standardized resource definition and communication steps, whereby resources coupled to a network can be quantified, specified and made available, widely or within limits such as to members of an enterprise, para [0002]), the network system comprising: a first service design center configured to: obtain a first network access notification message policy comprising a first network access trigger condition and an associated first network access notification message (Service Control Group also contains the several rules including: Triggering conditions for a given application (network events or connection state conditions), para [0103]-[0104]), the first network access trigger condition comprising one or more current or requested end-user device network access activities (can monitor usage to disconnect the user (disable further usage) or to change to a different billing rate if the limit is met, para [0009]), the first network access notification message comprising notification information to be presented to a user through a user interface, receive a trigger condition indication from a network element, associate the trigger condition indication with the first network access notification message (call Model of the SIP Application encounters a trigger event, the call set-up process is suspended and control passes to the Service Distribution Manager (SDM). SDM responds with either a Continue response, para [0123]); a network provisioning instruction translator (Provisioning and deploying resources as described provides a ready capability to generate billing records based on various factors that represent value to the user and cost to the supplier, i.e., factors that are closely related to supply and demand. For telephony applications, for example, besides basing billing in a traditional way on the duration of call, the endpoints and/or the time of day, the provisioning of resources that are accessed during the all makes it possible to generate even more service-specific billing criteria and information, para [0075]) configured to: receive, from the first service design center, the first network access trigger condition, and determine, based on the first network access trigger condition, one or more network access trigger identification instructions (defined Service Control Group has a list of one or more trigger events/conditions (e.g., Originating Dialed Digits Complete, Originating Called Party Busy, Originating No Answer, Originating Disconnect, Terminating Call Attempt, Terminating Called Party Busy, Terminating No Answer, Terminating Disconnect), para [0122]); and a network provisioning system configured to communicate the one or more network access trigger identification instructions to one or more network elements responsible for monitoring the service usage, the one or more network elements responsible for monitoring the service usage configured to: execute the one or more network access trigger identification instructions to identify when the first network access trigger condition occurs, and send the trigger condition indication to the first service design center (provisioned for a normal average load and arranged for additional resources to be used in pay per use situations (e.g., peaks), an indicator is included in the resource management record to identify the number of resources (e.g., call-minutes or bandwidth-minutes or some other measure) to be used before switching to a pay-per-use state. This switch can be a matter of instantaneous real time usage or an integrated total of usage over time, para [0086]). Milford does not expressly teach present the notification information to the user through the user interface. However Richter, in an analogous art, teaches present the notification information to the user through the user interface (current bandwidth consumption may be monitored in real time and presented, for example, via graphical user interface ("GUI"), data file, external report, or any other suitable means, para [0334]). It would have been obvious to one skilled in the art to combine the teachings of Milford with those of Richter in order to more efficiently allocate network resources in the data and voice communications system of Milford (see Richter para [0008]-[0010]).

Regarding claim 2, Milford further teaches a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set (distinct projects including revisions and updates to integrate the new service into provisioning systems, billing and accounting, network operations center systems for Alarms, traffic engineering and planning systems, network architecture polling, engineering for connectivity to the network, para [0065]).

Regarding claim 3, Milford further teaches wherein the master service design center is further configured to define a second notification policy design capability set for a second service design center (Service Controller needs to be notified and in the preferred embodiment is directly involved in selecting and signaling to successive applications that are invoked in a chain of successive applications. The Service Controller can make service allocation decisions (based on the subscriber's service profile and other factors) as to which application server and/or telecommunications application is to be added into the chain of activities, para [0114]), the second notification policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set (pay per use indicators that are related to the individual service, the policy or referral source used to invoke the service, the resource pool used to access the network element, the application server or media server used for a particular service invocation, loading conditions at any or all of these levels, etc., para [0075]).
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Supplemental Box

In case the space in any of the preceding boxes is not sufficient.
Continuation of:
Box No. V.2. Citations and explanations.

Regarding claim 4, Richter further teaches wherein the first network access trigger condition comprises a period of time since a previous network access trigger condition, and the first network access notification message comprises a real-time or near-real-time measure of an amount of service usage or a cost of service usage (a system management processing engine may be provided that is capable of working with a resource manager (e.g., monitoring agent) of a storage processing engine, and/or monitoring agents of other processing engines (e.g., application processing engines) to monitor the dynamic resource state in the system, para [0023]).

Regarding claim 5, Richter further teaches wherein the first network access trigger condition comprises an amount of service usage or a cost of service usage (using a resource usage accounting methodology that characterizes resource consumption for various types of information management and/or various types of information manipulation tasks, e.g., in a heterogeneous information management system environment, para [0368]), and the first network access notification message comprises a real-time or near-real-time measure of an aggregate service usage or an aggregate cost (in consideration of factors such as speed or efficiency in performance of a given subtask, cost of individual processor, para [0081]).

Regarding claim 6, Richter further teaches wherein the service design center is further configured to send a user notification message to a user of the end-user device based on the first network access notification message (alerts may be generated and communicated to a system administrator in a number of different ways including, but not limited to, by way of Web User Interface Alert Frame, via SNMP Traps, via Email notification, etc. Threshold alerts may be configured to be enabled or disabled by a system administrator. When the content delivery system reaches maximum capacity, all new stream requests may be rejected, para [0515]).

Regarding claim 7, Milford further teaches wherein the first service design center is hosted on an operator network (the network operator by providing information as to the average usage, peak usage and timing, etc., which enables the operator to understand and optimize its needs for guaranteed capacity versus peak handling, and to make the appropriate contracts to meet those needs, para [0084]).

Regarding claim 8, Milford further teaches wherein the first service design center is hosted on an enterprise network (an enterprise telephone exchange system, wherein the telecommunications devices could include a voicemail system, components of the voicemail system, such as audio recording and annunciator modules, a directory service module, para [0040]).

Regarding claim 9, Milford further teaches wherein the first network access trigger condition comprises a service usage limit or a specified amount of accrued cost (the Service Broker can establish and enforce a limit on shared access by a particular operator during call time. Other arrangements, such as reservation of minimum bandwidth or other resources, can be negotiated, bought, sold and bartered, para [0076]).

Regarding claim 10, Milford further teaches wherein the first network access trigger condition comprises a roaming service usage limit or specified amount of accrued roaming service cost (blocks and/or their associated information can be made available to one or more parties for exploitation, such as telecommunications carriers, network operators, subnet operators and the like. These parties are often in data communication over the public networks (or at least a wide ranging network) and also can commit some of their own processing power to be used according to defined terms by others coupled to the networks, para [0059]).

Regarding claim 11, Milford further teaches wherein the one or more network elements responsible for monitoring the service usage are configured to classify service usage by device application, and the first network access trigger condition comprises one or more device application access activities (information includes, without limitation, what the Logical Services are, what Applications they use, what sort of input is expected and output produced, how to supply an input and obtain an output, whether there are relationships with other Logical Services that affect their suitability to be used in conjunction or at the same time, some measure of relative value of the services, para [0058]).

Regarding claim 12, Milford further teaches wherein the one or more network elements responsible for monitoring service usage are configured to classify service usage by network
destination, and the first network access trigger condition comprises one or more device
network destination access activities (contain information on how requested data is to be formatted and its destination, with this information being comprehensible to transport processing engine 1050 and/or network interface processing engine, para [0115]).

Regarding claim 13, Milford further teaches wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in a wireless operator network (communications with other networks such as wireless network and/or cell phone communications, etc. The capabilities of each individual device may be greater or less than any other device in one category or another., para [0035]).

Regarding claim 14, Milford further teaches wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in an enterprise access network (example could be an enterprise telephone exchange system, wherein the telecommunications devices could include a voicemail system, components of the voicemail system, such as audio recording and annunciator modules, a directory service module, para [0040]).

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Box No. V.2. Citations and explanations.

Regarding claim 15, Richter further teaches wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located on a wireless device (the system management engine 1060 may maintain information on processing engine assignment and content delivery paths for various content delivery applications, substantially eliminating the need for an individual processing engine to have intimate knowledge of the hardware it intends to employ, para [0122]).

Regarding claim 16, Milford further teaches wherein the first network access notification message policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials (subscriber information could be limited to identity information such as a network address, or can include additional information for determining the subscriber's requirements, equipment configuration and the like, para [0061]), and the service design center is further configured to obtain a second network access notification message policy comprising a plurality of second network access trigger conditions and, for each of the plurality of second network access trigger conditions, an associated second network access notification message, the second network access notification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials (Service Control Group also contains the several rules including: Triggering conditions for a given application (network events or connection state conditions), para [0103]-[0104]).

Regarding claim 17, Milford further teaches wherein the first network access notification message policy comprises a subset of the second network access notification message policy (distinct projects including revisions and updates to integrate the new service into provisioning systems, billing and accounting, network operations center systems for Alarms, traffic engineering and planning systems, network architecture polling, engineering for connectivity to the network, para [0065]).

Regarding claim 18, Milford teaches a network system for classifying an accounting of access network service usage by an end-user device (a method and structure for standardized resource definition and communication steps, whereby resources coupled to a network can be quantified, specified and made available, widely or within limits such as to members of an enterprise, para [0002]), the network system comprising: a first service design center configured to: obtain a first accounting split classification policy defining classification rules for dividing an overall access network service usage into an enterprise service usage allocation and a personal service usage allocation (setting up and allotting resources to different categories, for example with scripts and prompts that present choices to the network operators in defining how the resources will be used to support its subscribers and customers, and potentially also made available otherwise, para [0083]); a network provisioning instruction translator (Provisioning and deploying resources as described provides a ready capability to generate billing records based on various factors that represent value to the user and cost to the supplier, i.e., factors that are closely related to supply and demand. For telephony applications, for example, besides basing billing in a traditional way on the duration of call, the endpoints and/or the time of day, the provisioning of resources that are accessed during the all makes it possible to generate even more service-specific billing criteria and information, para [0076]) configured to: receive the first accounting split classification policy from the first service design center, and determine, based on the first accounting split classification policy, one or more network service usage classification and reporting instructions (defined Service Control Group has a list of one or more trigger events/conditions (e.g., Originating Dialed Digits Complete, Originating Called Party Busy, Originating No Answer, Originating Disconnect, Terminating Call Attempt, Terminating Called Party Busy, Terminating No Answer, Terminating Disconnect), para [0122]); a network provisioning system configured to communicate the one or more network service usage classification and reporting instructions to one or more network elements responsible for classifying the service usage, the one or more network elements responsible for classifying the service usage configured to: execute the one or more network service usage classification and reporting instructions to determine the enterprise service usage allocation and the personal service usage allocation, and generate a service usage report (provisioned for a normal average load and arranged for additional resources to be used in pay per use situations (e.g., peaks), an indicator is included in the resource management record to identify the number of resources (e.g., call-minutes or bandwidth-minutes or some other measure) to be used before switching to a pay-per-use state. This switch can be a matter of instantaneous real time usage or an integrated total of usage over time, para [0086]). Milford does not expressly teach a service usage accounting system configured to receive the service usage report and, based on the usage report, accrue the enterprise service usage allocation and accrue the personal service usage allocation. However Richter, in an analogous art, teaches a service usage accounting system configured to receive the service usage report and, based on the usage report, accrue the enterprise service usage allocation and accrue the personal service usage allocation (current bandwidth consumption may be monitored in real time and presented, for example, via graphical user interface ("GUI"), data file, external report, or any other suitable means, para [0334]). It would have been obvious to one skilled in the art to combine the teachings of Milford with those of Richter in order to more efficiently allocate network resources in the data and voice communications system of Milford (see Richter para [0008]-[0010]).

Regarding claim 19, Milford further teaches a master service design center configured to define a first accounting policy design capability set for the first service design center, the first accounting policy design capability set comprising a first subset of a master policy capability set (distinct projects including revisions and updates to integrate the new service into provisioning systems, billing and accounting, network operations center systems for Alarms, traffic engineering and planning systems, network architecture polling, engineering for connectivity to the network, para [0065]).

Regarding claim 20, Milford further teaches wherein the master service design center is further configured to define a second accounting policy design capability set for a second service design center (Service Controller needs to be notified and in the preferred embodiment is directly involved in selecting and signaling to successive applications that are invoked in a chain of successive applications. The Service Controller can make service allocation decisions (based on the subscriber's service profile and other factors) as to which application server and/or telecommunications application is to be added into the chain of activities, para [0114]), the second accounting policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set (pay per use indicators that are related to the individual service, the policy or referral source used to invoke the service, the resource pool used to access the network element, the application server or media server used for a particular service invocation, loading conditions of any or all of these levels, etc, para [0075]).

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Box No. V.2. Citations and explanations.

Regarding claim 21, Milford further teaches wherein the first accounting split classification policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials (subscriber information could be limited to identity information such as a network address, or can include additional information for determining the subscriber's requirements, equipment configuration and the like, para [0061]), and the service design center is further configured to obtain a second accounting split classification policy, the second accounting split classification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials (Service Control Group also contains the several rules including: Triggering conditions for a given application (network events or connection state conditions), para [0103]-[0104]).

Regarding claim 22, Milford further teaches wherein the first accounting split classification policy comprises a subset of the second accounting split classification policy (distinct projects including revisions and updates to integrate the new service into provisioning systems, billing and accounting, network operations center systems for Alarms, traffic engineering and planning systems, network architecture polling, engineering for connectivity to the network, para [0065]).

Regarding claim 24, Milford teaches a network system for providing network access service control for an end-user device (a method and structure for standardized resource definition and communication steps, whereby resources coupled to a network can be quantified, specified and made available, widely or within limits such as to members of an enterprise, para [0002]), the network system comprising: a first service design center configured to obtain a first network access policy comprising one or more network access service permissions associated with the end-user device or a user of the end-user device (setting up and allotting resources to different categories, for example with scripts and prompts that present choices to the network operators in defining how the resources will be used to support its subscribers and customers, and potentially also made available otherwise, para [0063]; encryption and authorization techniques are available to limit the use of certain resources to authorized users or to monitor the extent of usage by particular users or groups, para [0009]); a network provisioning instruction translator (Provisioning and deploying resources as described provides a ready capability to generate billing records based on various factors that represent value to the user and cost to the supplier, i.e., factors that are closely related to supply and demand. For telephony applications, for example, besides basing billing in a traditional way on the duration of call, the endpoints and/or the time of day, the provisioning of resources that are accessed during the all makes it possible to generate even more service-specific billing criteria and information, para [0075]) configured to: receive, from the first service design center, the first network access policy, and determine, based on the first network access policy, one or more network access policy enforcement instructions (defined Service Control Group has a list of one or more trigger events/conditions (e.g., Originating Dialed Digits Complete, Originating Called Party Busy, Originating No Answer, Originating Disconnect, Terminating Call Attempt, Terminating Called Party Busy, Terminating No Answer, Terminating Disconnect), para [0122]); and a network provisioning system configured to communicate the one or more network access policy enforcement instructions to one or more network elements responsible for controlling network access (provisioned for a normal average load and arranged for additional resources to be used in pay per use situations (e.g., peaks), an indicator is included in the resource management record to identify the number of resources (e.g., call-minutes or bandwidth-minutes or some other measure) to be used before switching to a pay-per-use state. This switch can be a matter of instantaneous real time usage or an integrated total of usage over time, para [0086]). Milford does not expressly teach the one or more network elements responsible for controlling the service usage configured to: execute the one or more network access policy enforcement instructions to enforce network access service permissions and limits. However Richter, in an analogous art, teaches the one or more network elements responsible for controlling the service usage configured to: execute the one or more network access policy enforcement instructions to enforce network access service permissions and limits (active run-time enforcement of system operations may be advantageously employed to ensure the delivery of differentiated service(s) by enforcing policy-based access and delivery of system/subsystem resources in multi-tenant and/or multi-class of service environments, para [0020]). It would have been obvious to one skilled in the art to combine the teachings of Milford with those of Richter in order to more efficiently allocate network resources in the data and voice communications system of Milford (see Richter para [0008]-[0010]).

Regarding claim 35, Milford further teaches a master service design center configured to define a first control policy design capability set for the first service design center, the first control policy design capability set comprising a first subset of a master policy capability set (distinct projects including revisions and updates to integrate the new service into provisioning systems, billing and accounting, network operations center systems for Alarms, traffic engineering and planning systems, network architecture polling, engineering for connectivity to the network, para [0065]).

Claims 1-22 and 24-35 have industrial applicability as defined by PCT Article 33(4) because the subject matter can be made or used in industry.

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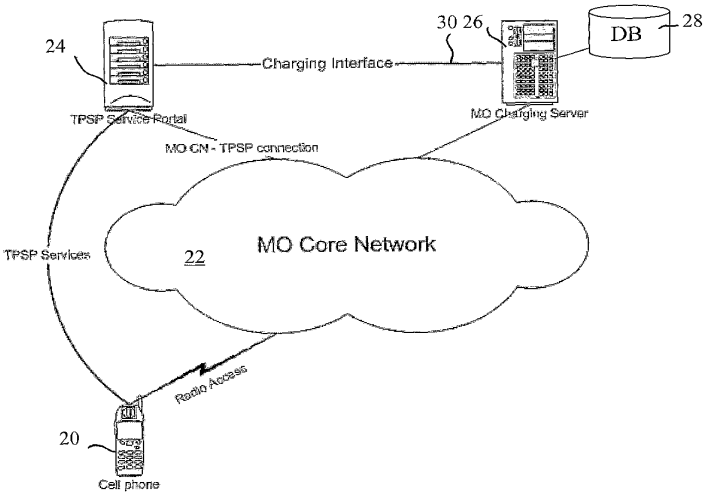
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For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: SERVICES IN A COMMUNICATION SYSTEM



(57) Abstract: A user device (20) is provided with information relating to a service wherein content is communicated to the user device via an access system provided by a communications network (22). In the method information regarding access charges from a charging entity (26) associated with the access system is provided to a service provider entity (24), where after an indication of total cost of the service covering content charges and the access charges is sent from the service provider entity to the user device. Alternatively, indication of the total costs can be sent directly to the user device from the charging entity.

WO 2006/120558 A1

SERVICES IN A COMMUNICATION SYSTEM

Field of the Invention

The present invention relates to services offered to end-users of a communication system, and more particularly, to services wherein content is delivered to user devices of the end-users.

Background of the Invention

A communication system is a facility which enables communication between two or more entities such as user terminal equipment (mobile or fixed) or other communication devices and/or network entities and other nodes associated with a communication system. The communication may comprise, for example, communication of voice, electronic mail (email), text messages, data, multimedia and so on. A communications system may also be used for providing users with services, typically for communication between users and service providers and for delivery of content data to the user devices. The content data delivery typically includes downloading of data from a remote node, such as a service provide server, via an access system of the communications system.

A communication system typically operates in accordance with a given standard or with a given set of specifications which set out what the various elements of a system are permitted to do and how that should be achieved. For example, the standard or specification may define if the user, or more precisely user equipment, is provided with access via a circuit switched bearer or a packet switched bearer, or both. Communication protocols and/or parameters which should be used for the access to the communication system are also typically defined. For example, the manner in which communication should be implemented between the user equipment and the

elements of the communication networks is typically based on a predefined communication protocol. In other words, a specific set of "rules" on which the communication can be based needs to be defined to enable the user equipment to communicate via the communication system.

Access for a user device to the communication system may be provided by a fixed line and/or wireless communication interface. An example of communication systems providing wireless access are public land mobile networks (PLMN). In a more detailed example the end-user may access the service via a GPRS (General Packet Radio Service) or another cellular wireless access system operated by a telephone operator. Other examples pf possible wireless access systems include various wireless local area networks (WLANs) and satellite based systems. Examples of communication systems providing fixed line access include public switched telephone networks (PSTN), cable networks, digital subscriber line (DSL) networks, and so on.

Content services can be provided by third party service providers (TPSP). The end-users can be subscribers of an operator, for example a fixed line operator or a mobile operator (MO), and commonly use an access network of a telecommunications system operator to contact the third party service provider's service portal. When a third party service provider (TPSP) provides a service to an end-user, it may need to indicate the price of the service to the end-user. The total cost of the service may need to be presented, for example, for customer service reasons. In some countries the cost may need to be indicated for legal reasons.

The third party service provider typically knows the price of the content which it delivers. However, if for example a downloadable game or other considerable data volume is delivered, the end-user may also need to pay for the access costs. The problem is that the third party service provider does not necessarily know what will the access charges be. For example, the third party service provider may not be aware of the access charges for a particular content download.

Arrangements wherein a charging interface is provided between a third party service provider (TPSP) and a mobile operator (MO) have been proposed. In a scenario a TPSP may use a charging interface to request charging information from the mobile operator whose subscriber the end-user is. However, the charging interface has not been designed for provision of information to the end-user relating to the total cost of a particular content download and it's delivery, for example via a GPRS access system. Instead, the cost that has typically been indicated to the end-user is the price of the content itself with a vague reference to additional access charges that may apply. This may not enable the end-user to get any realistic indication of the likely total costs, unless he or she is able to convert the volume of the content to be downloaded to the access charge costs applicable at that specific time. This may not satisfy legislative requirement of some countries where it might be required that the end-user must be given a substantially accurate indication of the total cost of the service.

Summary of the Invention

In accordance with an embodiment there is provided a method for providing a user device with information relating to a service wherein content associated with a service provided by a service provider is communicated to the user device via an access system provided by a communications network. In the method information regarding access charges of the access system is generated. Said information regarding access charges of the access system is then communicated together with content charges of the service provider to the user device.

Another embodiment provides a charging server comprising means for generating information regarding access charges of an access system of a communication network when content that is associated with a service provided by a service provider is communicated to a user device via the access system, and an interface for sending said information regarding

access charges of the access system for communication together with content charges of the service provider to the user device.

Another embodiment provides a service provider entity, comprising an interface for receiving information from a charging entity associated with an access system of a communication network relating to costs of the access system for communication of content that is associated with a service provided by the service provider entity to a user device via the access system, and means for sending information regarding access charges of the access system for communication together with content charges of the service provider to the user device.

The embodiments of the invention may provide an advantage in that making it easier for the end-users to make decisions on whether to buy a service or not. The embodiments may enable providing the user with an indication of the total service costs. Such an indication may make the available services more attractive for end-users. Charging services offered by the operators may also become more attractive for third party service providers.

Brief Description of the Drawings

For a better understanding of the present invention and how the same may be carried into effect, reference will now be made by way of example only to the accompanying drawings in which:

Figure 1 shows a schematic view of a communications system wherein the invention may be embodied;

Figure 2 shows a flowchart for operation in accordance with an embodiment of the present invention;

Figure 3 is a sequence diagram in accordance with an embodiment the invention.

Figure 4 shows signalling flows in accordance with an embodiment;

Figure 5 shows a flowchart for operation in accordance with an embodiment;

Figure 6 shows a flowchart for operation in accordance with a further embodiment.

Detailed Description of Embodiments of the Present Invention

To assist in understanding the invention, an explanation of a possible underlying communication system is given first with reference to elements of a cellular mobile communication network as defined by the third generation partnership project (3GPP). It is noted that although certain embodiments will now be described by way of example, with reference to the exemplifying architectures of a communication system comprising 3GPP mobile access networks and/or wireless local area networks, embodiments may be applied to any other suitable forms of communication systems than those illustrated and described herein.

A user device of an end-user may communicate data in association with various services based on an appropriate data communication protocol. In Figure 1 the services available for mobile user devices 20 (only one shown for clarity) are provided by a service provider portal 24. The portal may be provided by a server or any other appropriate data processing device capable of communicating with user devices. The services may be provided, for example, by means of the Internet Protocol (IP), and thus the portal 24 can be understood as, for example, denoting an Internet Protocol (IP) based device.

A mobile communication system 22 is typically arranged to serve a plurality of mobile user devices which have accessed wirelessly the access system. A core network part of the communication system is typically connected to a number of access networks, typically to base station systems. The base stations are arranged to transmit signals to and receive signals from a mobile user equipment, via respective wireless interfaces. Correspondingly, each mobile device is able to transmit signals to and receive signals from the base stations via the wireless interface. In a typical operation a mobile

communication network provides packet switched data transmission in the packet switched domain between a support node and mobile user equipment via the access system.

A non-limiting example of a possible mobile network is the 3rd generation cellular network wherein a mobile user device may connect to an access network by setting up a PDP (Packet Data Protocol) context through a GPRS (General Packet Radio Service) network. The GPRS service allows transmission of packet data between mobile communication devices and external data networks. In this case the mobile network 22 would be connected to external data networks, for example the Internet, via a gateway GPRS support node (GGSN). Each PDP context provides a communication pathway between a particular user and a gateway node of the network. Once the PDP context is established, it can typically carry multiple flows. Each flow normally represents, for example, a particular service and/or media component of a particular service. The PDP context therefore often represents a logical communication pathway for one or more flows across the network. To implement the PDP context between user equipment and a node, radio access bearers need to be established which commonly allow for data transfer for the user equipment. Another option to wirelessly access services is to set up an IPsec tunnel through a WLAN network that is then connected to a core communication network.

A mobile communication device within an access network may communicate with a radio network controller via radio network channels which are typically referred to as radio bearers. Each mobile device such as a mobile user equipment may have one or more radio channels open at any one time with the radio network controller. Any appropriate mobile device adapted for Internet protocol (IP) communication maybe used to connect to the network. For example, a user may access the cellular network by means of communication devices such as a personal computer, personal data assistant (PDA), mobile station (MS), portable computer, combinations thereof or the like.

The mobile communication device can be used for various tasks such as making and receiving phone calls, for receiving and sending data from and to a network and for experiencing, for example, multimedia or other content. The communication device is typically provided with a processor and memory for accomplishing these tasks. The operation of the user equipment may be controlled by means of a suitable user interface such as key pad, voice commands, touch sensitive screen or pad, combinations thereof or the like.

The following describes an exemplifying embodiment for charging of services provided by third party service providers utilizing bearer services offered by a mobile operator. The example is described with reference to Figure 1 wherein an end-user using a mobile terminal (MT) 20 is a subscriber to a mobile operator (MO) operating network 22. The end-user may request for services provided by a third party service provider (TPSP) portal 24.

Use of the services can be charged by the third party service provider by sending of charging requests to a charging server 26 hosting the end-user charging account. The mobile operator (MO) may be responsible for the operation of the communications network 22 and the charging server 26. The charging server 26 may be based on an existing charging server of an operator. In such case the server and/or system functionality thereof may need to be updated to support the new functionalities required by the embodiment.

An online charging web service interface 30 is provided between the third party service provider portal 24 and charging server 26. The charging interface may be provided by an external data network, for an Internet Protocol based network and/or via the communications network 22. The online charging interface 30 supports communication of indications associated with the costs of services. The third party service provider portal 24 may use the charging interface 30 to charge via operator based billing the end-users for the services the end-users are using. The online charging interface 30 can be used to indicate the charges that are applicable to a service provided to user devices in an access system associted with the charging server. This is

an important improvement on the prior art charging interfaces which have not been used for consideration how access charges, in addition to the content price, that relate to delivery of the content can be reported to the TPSP in order to provided the end-user with an indication of the total cost of the content download.

A database 28 is also provided for storing information needed to resolve the access changes for a specific service. The database may be hosted by the mobile operator, or any other appropriate party. The database 28 may be integrated with the server 26, or the server may be provided with an access thereto.

Figure 2 shows a flowchart for operation in accordance with an embodiment. In the embodiment a user of a user device is provided with information relating to the cost of using a service before he/she makes a definitive decision whether to order the service. In Figure 2 embodiment the service provider first sends a request for information about access charges to a charging entity associated with an access network of a communication system at step 100. This is not always necessary, and information about the access charges may also be provided to the service provider entity without a specific request, for example periodically. Information regarding access charges is communicated in step 102 from the charging entity to the service provider entity. Communication between the entities may occur via the interface 30 of Figure 1.

When generating the information, the charging entity may fetch relevant information from a database. The service provider entity may then generate an appropriate indication of total cost of the service covering content charges and the access charges, and send the indication to the user device at step 104. This communication may occur via the communication network 22.

The cost may then be displayed to the user, step 106. This preferably occurs before the service is taken into use at the user device, i.e. before the user has decided if he/she wants to use the service. The cost can be presented for the

end-user only for information, and the service provision is continued automatically, step 108. Alternatively, the end user may be asked to accept the cost, see step 110. In the latter case, if the cost are acceptable at step 112, the user may order the service by sending his acceptance, step 116. If the costs are not acceptable, the user does not respond at all, or sends a denial, and may not be charged, step 114.

There are various ways to support the providing of indications regarding the access charges from the content that is to be downloaded, if the service is ordered. According to a possibility the service provider 24 may request information regarding the access charges via the on-line charging interface 30. The charging web service provided by server 26 supports the relevant service interface and charging server functionality. The service interface is on the operator side of the connection, i.e. the charging interface is controlled by the operator. The TPSP can be seen as the client of the charging service. The charging interface can be used for all exchange of charging information between the service provider and the charging entity of the operator.

The signalling flow of Figure 3 shows operation in accordance with this embodiment in more detail. In the flow chart the solid lines present functionalities that are required by this embodiment and dashed lines describe functionalities that may be needed to support the particular communication environment, but are not necessary. Dotted lines are for information purposes only.

The end-user requests for a service, for example a game or other content, from a service provider by message 1. Optional messages 2 and 3 may be signalled for discovery of a charging web service interface (WSI) service, for example by using a functionality provided by the Project Liberty Alliance. A request 4 containing information about the service and the end-user is then sent from the service provider to the operator. Request 4 may contain information regarding the end-user, the requested service, volume of the content, the access bearer and so on. This message may also include various other parameters, such as information regarding rates, credit reservations,

credit deductions, credit checks, charging method and so on. The charging system can be made aware of what access bearer the terminal is using based on a service identifier or a correlation-identifier in the request that is received by the charging system. This can be, for example, a user identity or a dynamically defined service identity that is defined when the access is initiated.

The operator owned charging entity may then resolve at step 5 the costs of the access charges based on the received information and information stored in a database. At step 6 the charging entity may debit funds both for content and access charges from an end-user account, make a respective reservation or reservation on a user account. or take any other required action required for the actual charging.

A response message 7 may contain information regarding granted charging units and a specific field or parameter for indicating either the total const or at least the access charges for the service. The online charging interface mechanism can include to the response message the access charges that the service provider server can then add to the price of the content. According to an alternative the response can contain the total charges of the service, for example if the service is also rated by the operator.

The total charges or the access charge only caused by the download are then indicated to the service provider by message 7. The service provider may then indicate the price to the end-user by message 8.

In accordance with a possibility, in case the operator is also rating charge of the content, the mobile operator can indicate the costs of the service directly to the end-user through appropriate channels.

The end-user may then confirm that he/she is willing to use the service by message 9. The service is delivered by signalling 10. After completion of the service delivery the success thereof may be indicated to the TPSP by signalling 11.

In case of the first request towards the operators charging infrastructure only made a reservation of charging units, the reserved units can be committed in response to message 12.

According to another possibility the service provide is provided with a database that contains access charge rates for all its customers. This may be a more complicated to provide, because the service providers do not commonly define themselves what the access charges are. Thus even in this alternative the service provider needs to request information from the operator of the end-user. The end-user may also have different tariffs for the access charges depending the time of the day, so the service provider may need frequently update the information.

Further exemplifying embodiments will now be described with reference to Figures 4 to 6. In these embodiments a user device 20 is involved, at least to a degree, in generation of the total charge information. The involvement of the user device 20 may be provided in various ways. For example, the user device may be made aware of the access charges incurred for data traffic. This information may come from the access network 22. The access charge information available at the user device 20 may then be utilised either at the user device or at an appropriate entity at the network side when calculating the total charge.

A possible way to provide the communication interfaces of Figure 4 is to use an HTTP/XML (Hypertext Transport Protocol/ eXtensible Markup Language)-based Web Services interface towards the operator network and a similar interface towards the content provider. It is also possible to simply use HTTP-headers for the communication.

In the embodiment of Figure 5 the user device 20 is provided with information regarding the access charges at step 200 and information regarding the content charges at 202, where after the user device itself may calculate at 204 the total charge. This scenario enables operation wherein no action is required from the content provider, or another entity at the network side.

In accordance wit ha specific example, the user device may use appropriate data, for example metadata such as information contained in JAD-files of Java 2 Platform Micro Edition (JME2) to calculate the price of the transmission. JME2 is a Java application environment providing a framework for the deployment and use of Java technology. A JAD file is a Java Application Descriptor file that contains information about a Java Archive Repository (JAR) file. A JAD file contains the name, file size, and version of the actual JAR content file. This information may then be displayed or otherwise reported to the user at 206, preferably before the user accepts the download. The user device may be configured to wait until it receives an indication of acceptance of the total cost of the service, for example an activation of a predefined key or menu option. The request for the service may then be transmitted in response to said indication.

In an another embodiment shown in Figure 6 a user device is provided with access charge information at step 300. The user device may then report the access charge information at 302 to the content provider or another appropriate entity at the network. The information from the user device may then be used at the network side at 304 in calculating the total charge. The full, complete purchase price may then be reported at 306 to the user device based on at least partially information originating from the user device at step 302. The total cost may then be presented to the user at 308.

In a further embodiment the content provider may be able to dynamically adjust the price of the content based on the subscriber's traffic charges. For example, to be able to offer uniform pricing for all users, those with flat-rate data subscriptions may be charged relatively more compared to those with high data traffic costs. The perceived end-user price would stay the same. Communications to the operator may be enabled for example for the purposes of traffic compensation negotiations or other arrangements.

On the operator-side, an interface may be provided for queries from user devices regarding the prices for packet data traffic. The interface may be positioned at a charging server or similar charging element of the network. On the content provider side, the server 24 may be adapted to interpret pricing information provided in various formats. The information can be provided, for example, in the form of an XML-request or can be supplied in the content request HTTP-headers and so on.

The overall high-level message flow of Figure 4 may be as follows. The user device 20 may send at 15 a request to the operator querying the current data charging rate. The charging rate can be given, for example, per Megabyte. An appropriate network node 22, for example a charging server, then responds at 16 with the current data-charging rate. The user device may then request at 17 for a service or content from a content provider 24. The user device includes information regarding the current data charging rate in the request. The content provider may then calculate the total content price, and reply at 18 with the total charge for the content.

Steps 15 and 16 may be performed periodically, for example as once a day or a week. The results can be cached in the memory of the user device. The operator core network may also push the charging rate information to the user device periodically, and/or advice the user device to update the rate information when the rates change.

According to a further embodiment the content provider and the access network operator may interact and automatically agree on various features, for example on possible discounts to the packet data traffic rates. The content provider may, for example, sponsor the traffic charges for some user segments.

Embodiments may be made independent of the actual payment mechanism that is used to pay for the content. Some of the embodiments may allow a non-affiliated content provider to offer a service with a known total price without relationships with the network operator.

The required data processing functions may be provided by means of one or more data processors. Appropriately adapted computer program code product may be used for implementing the embodiments, when loaded to a computer, for example a processor of the communication device and/or any of the other nodes associated with the operation. The program code means may, for example, perform the generation of messages and/or information elements, interpretation and so forth. The program code product for providing the operation may be stored on and provided by means of a carrier medium such as a carrier disc, card or tape. A possibility is to download the program code product via a data network. The required data processing functionalities of the user device 20 may be embedded in, for example, a browser or an appropriate content discovery client 21 of the user device. A mechanism for providing an advice of the charges for the end user may be provided at the user device and/or at the content provider.

The herein described embodiments enable an end user to have a single price for a service inclusing access charges and content charges. This information can be provided for a user before he/she decides to use the service. The total costs or the rate of a service can be also presented during service provision session, for example after a rate of a video streaming service changes, or a certain predefined cost has been exceeded.

It is noted that whilst embodiments of the present invention have been described in relation to communication devices such as mobile stations, embodiments of the present invention are applicable to any other suitable type of devices suitable for communication via a communications network.

It is also noted that although the above example relates a request-response model, the services may be pushed to user devices. For example, a service provider server may detect based on a database or its settings that a communication device is present in an access network, and that it may wish to use a service. In this model a specific request by the end-user may not be necessary.

It is noted that even though the exemplifying embodiments shown and described in this disclosure use the terminology of the 3rd generation (3G) WCDMA (Wideband Code Division Multiple Access) networks, such as UMTS (Universal Mobile Telecommunications System), CDMA2000 systems and wireless local area networks, embodiments of the proposed solution can be used in any communication system wherein advantage may be obtained by means of the embodiments of the invention, fort example for providing an access system for an IPsec tunnel.

It is also noted herein that while the above describes exemplifying embodiments of the invention, there are several variations and modifications which may be made to the disclosed solution without departing from the scope of the present invention as defined in the appended claims.

Claims

1. A method for providing a user device with information relating to a service, wherein content associated with a service provided by a service provider is communicated to the user device via an access system provided by a communications network, said method comprising:

generating information regarding access charges of the access system; and

communicating said information regarding access charges of the access system together with content charges of the service provider to the user device.

2. A method as claimed in claim 1, wherein the step of communicating comprises sending an indication of total cost of the service including content charges and the access charges to the user device.

3. A method as claimed in claim 1, comprising the step of sending said information regarding access charges from a charging entity associated with the access system to a service provider entity, wherein the step of communicating comprises sending an indication of total cost of the service including content charges and the access charges from the service provider entity to the user device.

4. A method as claimed in claim 1, wherein the step of communicating comprises sending an indication of total cost of the service including content charges and the access charges from a charging entity associated with the access system to the user device.

5. A method as claimed in any preceding claim, wherein the step of communicating occurs before the service is taken into use at the user device.

6. A method as claimed in any of claims 1 to 4, wherein the step of communicating occurs during use of the service.

7. A method as claimed in any preceding claim, further comprising sending from the service provider entity to the charging entity information identifying the service and the user device.

8. A method as claimed in any preceding claim, further comprising sending from the service provider entity to the charging entity a message containing information regarding at least any one of the user device, the service, volume of content to be communicated, and a data bearer between the user device and the access network.

9. A method as claimed in any preceding claim, further comprising the steps of

sending a request for the service from the user device to a service provider entity;

discovering an appropriate charging entity in response to receiving the request for the service at the service provider entity; and

sending from the service provider entity to the discovered charging entity information identifying the service and the user device.

10. A method as claimed in any preceding claim, further comprising resolving access charges associated with use of resources of the access system at a charging entity based on information associated with the service and the user device as received from a service provider entity and information from a database.

11. A method as claimed in any preceding claim, wherein the step of sending information regarding access charges from the charging entity comprises sending further information regarding other charges.

12. A method as claimed in claim 11, wherein said step of sending further information comprises sending information regarding total charges for the service.

13. A method as claimed in any preceding claim, further comprising sending an acceptance of the total cost from the user device.

14. A method as claimed in any preceding claim, comprising sending information regarding the access charges from the user device.

15. A method as claimed in claim 14, comprising receiving information regarding access charges at the user device prior the step of sending the information regarding the access charges from the user device.

16. A method as claimed in claim 15, comprising pushing rate information from the communications network to the user device.

17. A method as claimed in claim 15, comprising sending periodically rate information from the communications network to the user device.

18. A method as claimed in claim 15, comprising sending rate information from the communications network to the user device after a rate change.

19. A method as claimed in claim 15, comprising sending a request for rate information from the user device to the communications network.

20. A method as claimed in claim 1, wherein the step of generating comprises generating said information regarding the access charges at the user device.

21. A method as claimed in claim 1, wherein the step of generating comprises generating said information regarding the access charges at the user device based on metadata.

22. A method as claimed in claim 1, comprising processing information received from the user device to obtain a total cost for of the service.

23. A method as claimed in claim 22, wherein the step of processing information comprises processing, at an entity connected to the communications network, information regarding the access charges received from the user device and information regarding content charges to obtain the total cost for of the service.

24. A method as claimed in claim 22, wherein the step of processing information comprises dynamically adjusting the content charges based on information received from the user device.

25. A method as claimed in any preceding claim, comprising including by the user device the information regarding access charges into a request for the service.

26. A method as claimed in any preceding claim, wherein the user device comprises a mobile device, and the access system comprises an access network of a mobile communication network.

27. A method as claimed in any preceding claim, comprising communication of data between the charging entity and the service provider via a separate data network.

28. A method as claimed in claim 27, wherein the separate data network comprises an Internet Protocol network.

29. A computer program comprising program code means configured to perform the steps of any of claims 1 to 27 when the program is run on a computer.

30. A charging server for a communications network, said charging comprising:

means for generating information regarding access charges of an access system of the communications network when content that is associated with a service provided by a service provider is communicated to a user device via the access system; and

an interface for sending said information regarding access charges of the access system for communication together with content charges of the service provider to the user device.

31. A charging server as claimed in claim 30, wherein the interface is configured for communication of said information regarding access charges of the access system to a service provider entity.

32. A charging server as claimed in claim 30 or 31, wherein the means for generating information is configured to process information identifying the service and the user device.

33. A charging server as claimed in any of claims 30 to 32, wherein the means for generating information are configured to resolve access charges associated with use of resources of the access system at a charging entity based on information associated with the service and the user device and information from a database.

34. A charging server as claimed in any of claims 30 to 33, wherein the means for generating information are configured to generate information regarding other charges.

35. A charging server as claimed in claim 34, wherein the means for generating information are configured to generate said information regarding total charges for the service.

36. A charging server as claimed in claim 35, wherein the interface is for communication of said information regarding the total charges for the service to the user device.

37. A charging server as claimed in any of claims 30 to 36, wherein the interface is configured for communication of data via a data network.

38. A charging server as claimed in claim 37, wherein the data network comprises an Internet Protocol network.

39. A charging server as claimed in claim 30, wherein the means for generating are configured to generate the information regarding the access chares based on information received from the user device.

40. A service provider entity, comprising:
an interface for receiving information regarding access charges of the access system for communication of content that is associated with a service provided by the service provider entity to a user device via an access system of a communications network; and
means for sending information regarding access charges of the access system for communication together with content charges of the service provider to the user device.

41. A service provider entity as claimed in claim 40 being configured to receive said information regarding access charges from a charging entity associated with the access system of the communications network.

42. A service provider entity as claimed in claim 41, configured to discover an appropriate charging entity in response to receiving a request for the service.

43. A service provider entity as claimed in claim 42, configured to provide the discovered charging entity with information identifying the service and the user device.

44. A service provider entity as claimed in claim 40 being configured to receive said information regarding access charges from the user device.

45. A communication system comprising at least one of a charging server in accordance with any of claims 30 to 39 and a service provider entity in accordance with any of claims 40 to 44,

46. A method for providing charging information relating to a service provided by a service provider, wherein content associated with the service is communicated to the user device via an access system provided by a communications network, said method comprising:

providing the user device with information regarding access charges of the access system;

providing the user device with information regarding content charges; and

processing said information regarding the access charges of the access system and said information regarding the content charges in the user device to provide a total charge.

47. A method as claimed in claim 46, further comprising receiving by the user device an indication of acceptance of the total cost of the service; and sending a request for the service in response to said indication.

48. A method as claimed in claim 46, comprising receiving information regarding access charges at the user device.

49. A method as claimed in claim 46, comprising pushing rate information from the communications network to the user device.

50. A method as claimed in claim 46, comprising sending periodically rate information from the communications network to the user device.

51. A method as claimed in claim 46, comprising sending rate information from the communications network to the user device after a rate change.

52. A method as claimed in claim 46, comprising sending a request for rate information from the user device to the communications network.

53. A method as claimed in claim 46, wherein the step of generating comprises generating said information regarding the access charges at the user device.

54. A method as claimed in claim 46, wherein the step of generating comprises generating said information regarding the access charges at the user device based on metadata.

55. A user device comprising:
a receiver for receiving content associated with a service via an access system of a communications network;
a controller configured to process information regarding access charges of the access system and information regarding content charges to provide a total charge; and
a user interface for presenting the total charge.

56. A user device as claimed in claim 55 being configured to receive an indication of acceptance of the total cost of the service, and to send a request for the service in response to said indication.

57. A user device as claimed in claim 55, wherein the controller is configured to process information regarding access charges received from the communications network.

58. A user device as claimed in claim 55, wherein the controller is configured to generate said information regarding the access charges.

59. A user device as claimed in claim 55, wherein the controller is configured to generate said information regarding the access charges based on metadata.

60. A user device as claimed in claim 55, comprising a memory for storing access charge information.

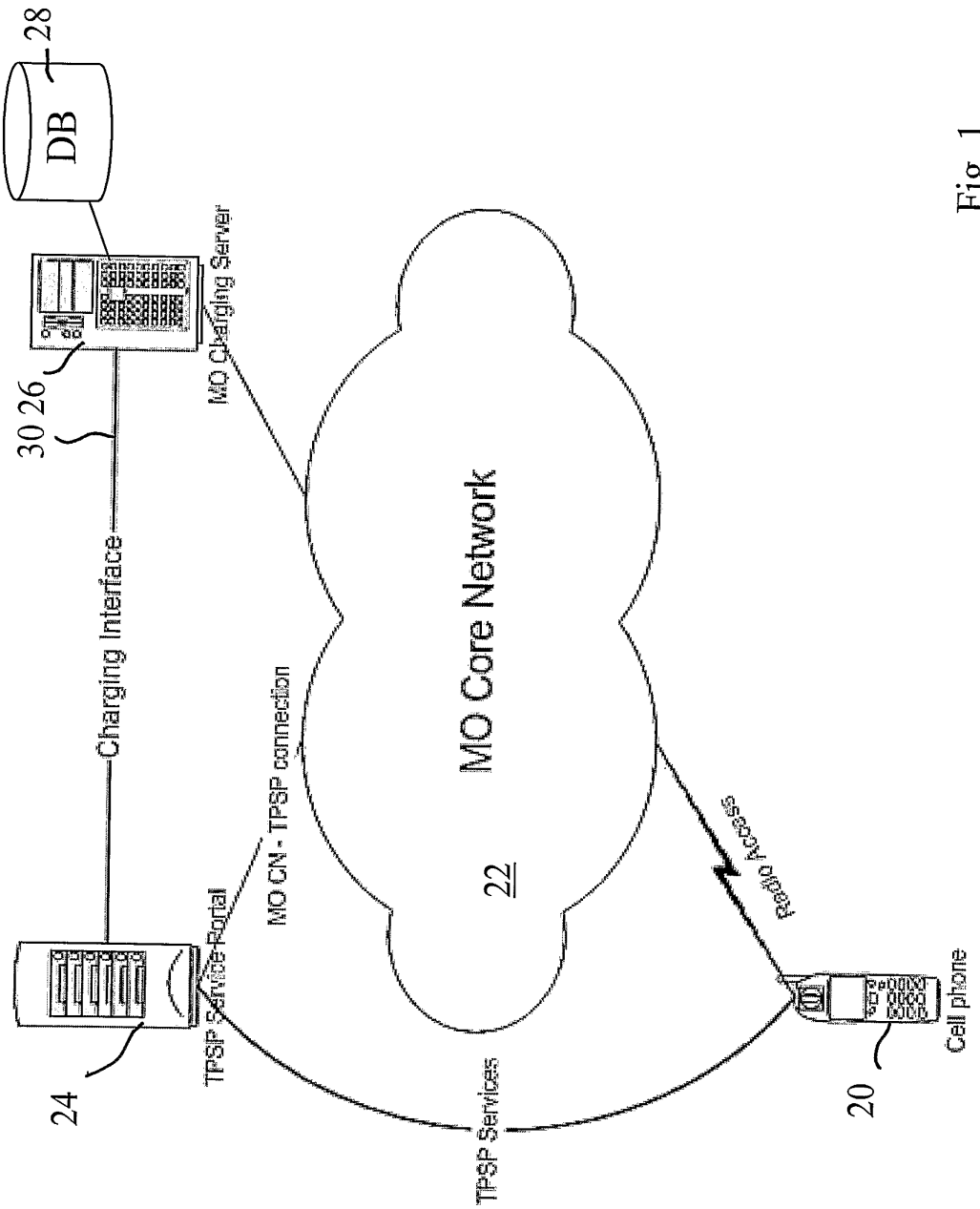

28
DB
MO Charging Server
30 26
Charging Interface
MO Core Network
22
MO CN - TPSP connection
TPSP Service Portal
Radio Access
Cell phone
24
TPSP Services
20

Fig. 1

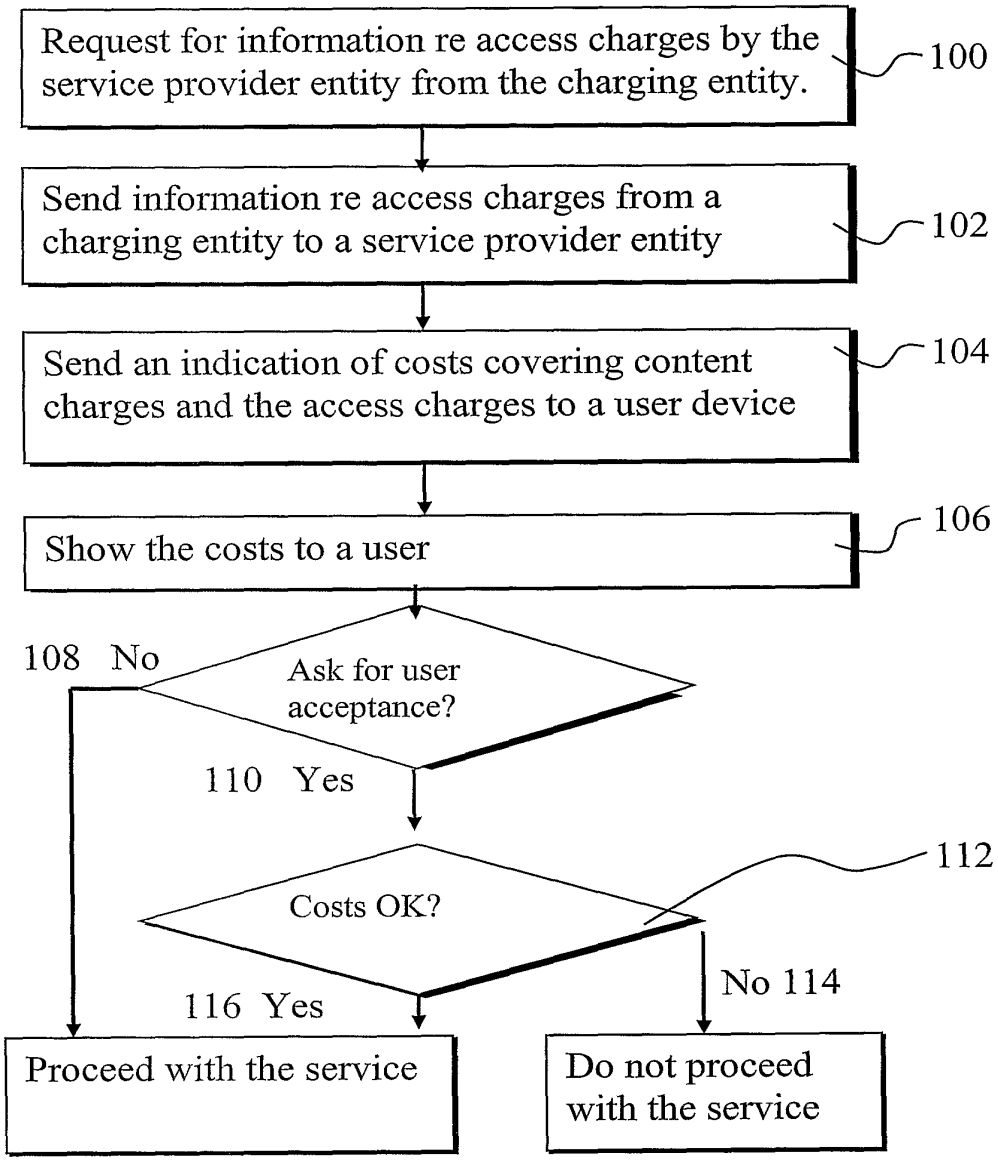

Request for information re access charges by the service provider entity from the charging entity.
100
Send information re access charges from a charging entity to a service provider entity
102
Send an indication of costs covering content charges and the access charges to a user device
104
Show the costs to a user
106
108 No
Ask for user acceptance?
110 Yes
Costs OK?
112
No 114
116 Yes
Proceed with the service
Do not proceed with the service

Fig. 2

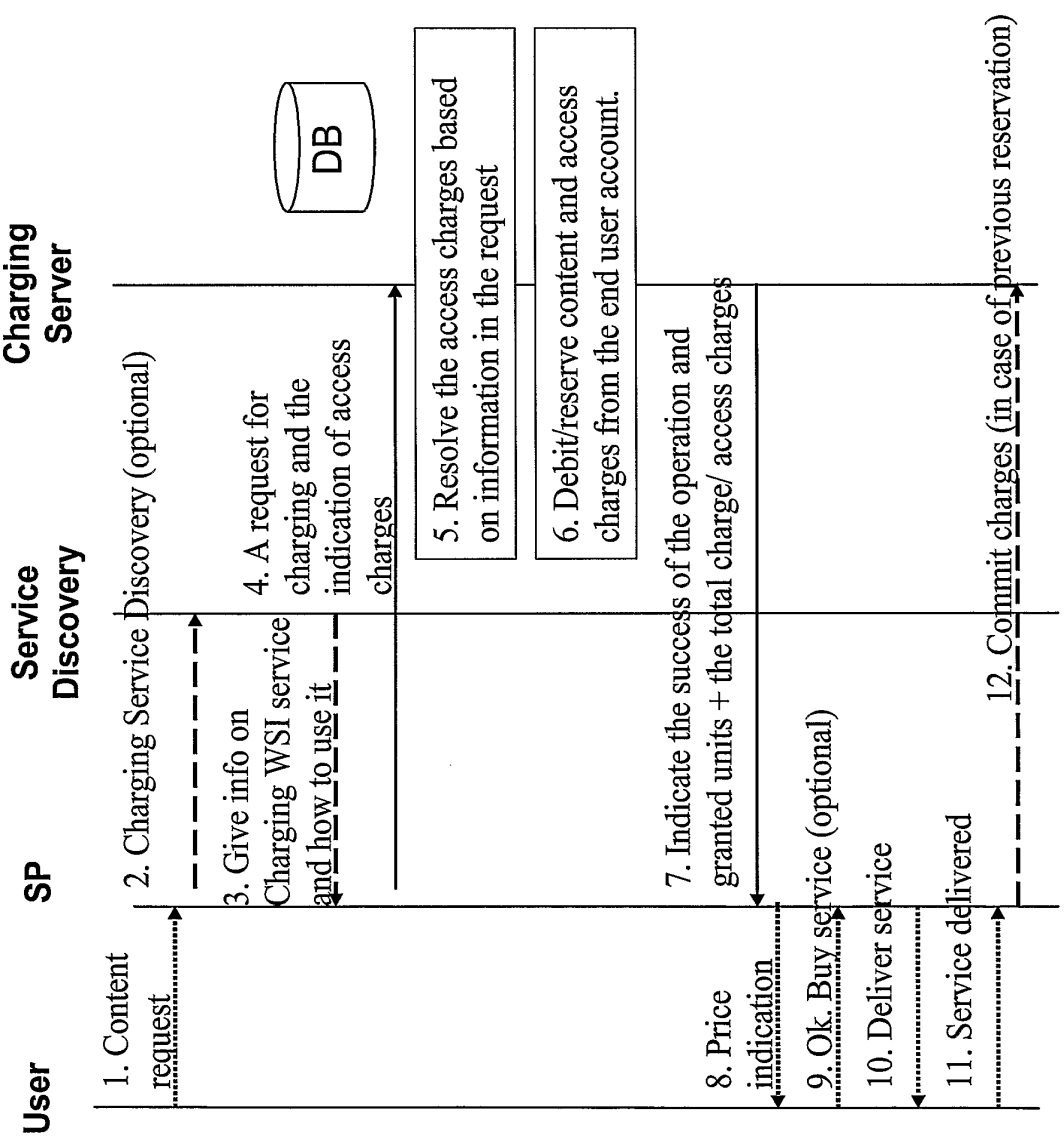

User
SP
Service Discovery
Charging Server
DB
1. Content request
2. Charging Service Discovery (optional)
3. Give info on Charging WSI service and how to use it
4. A request for charging and the indication of access charges
5. Resolve the access charges based on information in the request
6. Debit/reserve content and access charges from the end user account.
7. Indicate the success of the operation and granted units + the total charge/ access charges
8. Price indication
9. Ok. Buy service (optional)
10. Deliver service
11. Service delivered
12. Commit charges (in case of previous reservation)

Fig. 3

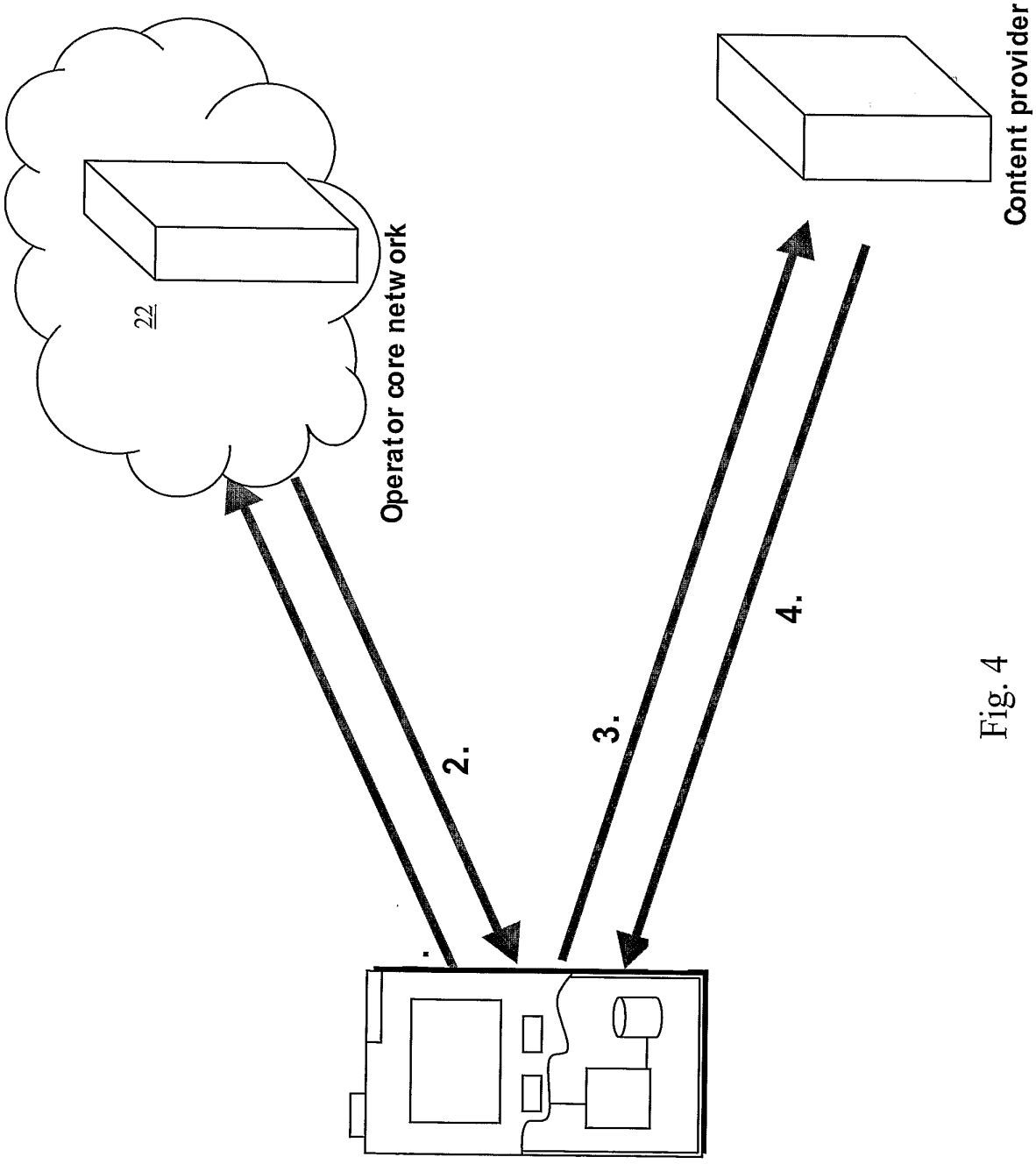


Fig. 4

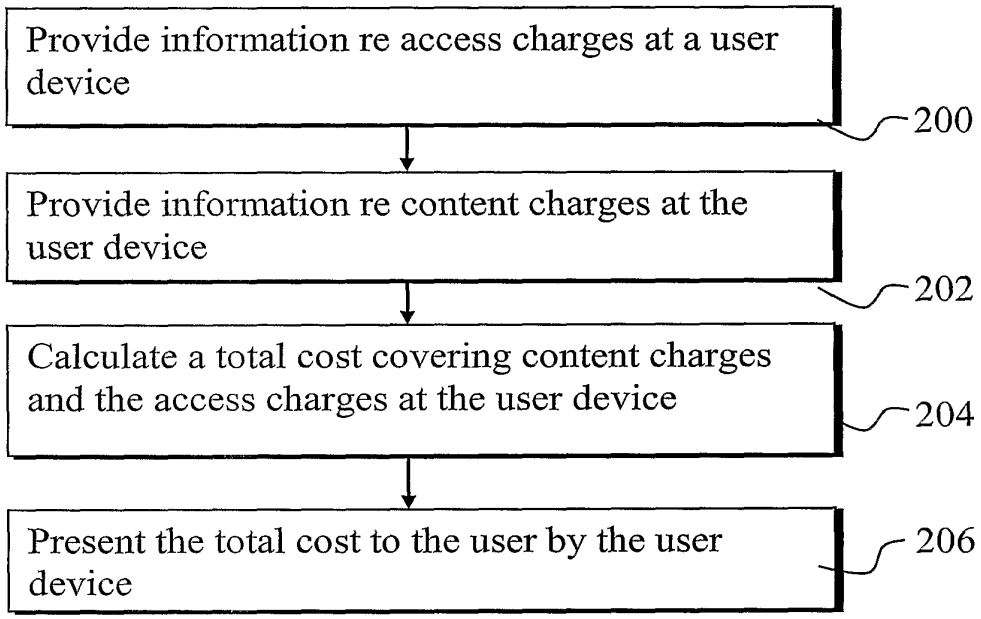

Provide information re access charges at a user device
200
Provide information re content charges at the user device
202
Calculate a total cost covering content charges and the access charges at the user device
204
Present the total cost to the user by the user device
206

Fig. 5

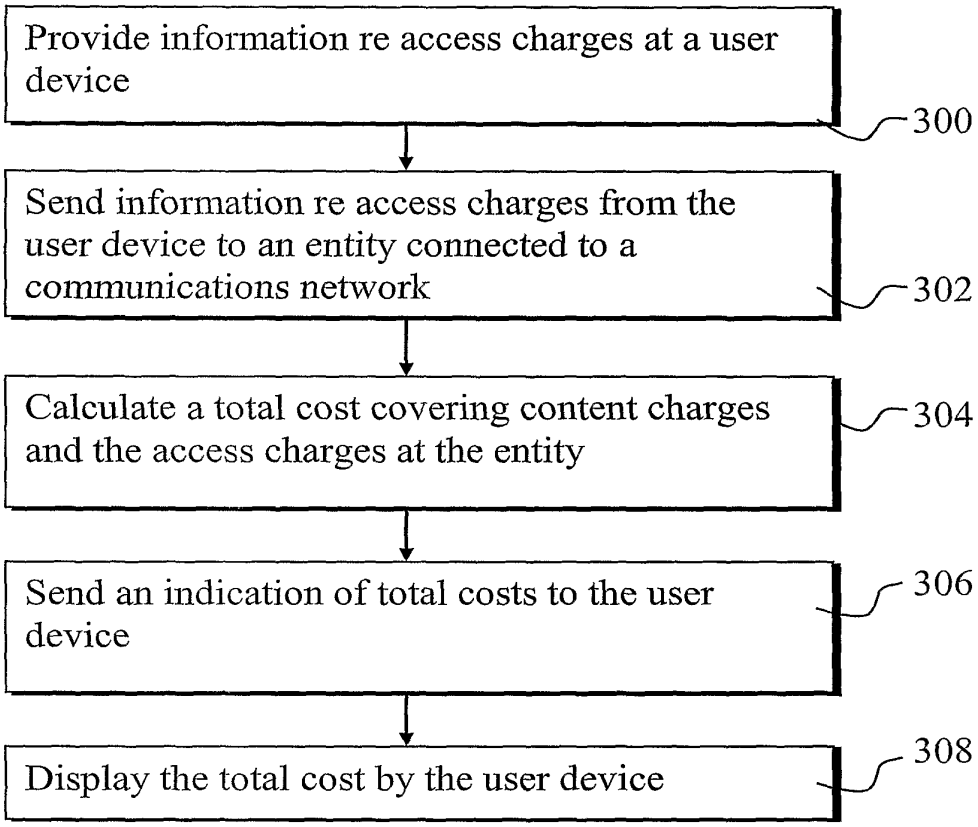

Provide information re access charges at a user device
300
Send information re access charges from the user device to an entity connected to a communications network
302
Calculate a total cost covering content charges and the access charges at the entity
304
Send an indication of total costs to the user device
306
Display the total cost by the user device
308

Fig. 6

INTERNATIONAL SEARCH REPORT

International application No
PCT/IB2006/001254

A. CLASSIFICATION OF SUBJECT MATTER
INV. G06Q20/00 H04M15/00

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
H04M H04L G06Q

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)
EPO-Internal, PAJ, WPI Data, INSPEC

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2004/039656 A1 (GERBER HEIKO ET AL) 26 February 2004 (2004-02-26) paragraph [0003] - paragraph [0005] paragraph [0008] - paragraph [0012] paragraph [0016] - paragraph [0025] -----	1-60
X	US 2003/083990 A1 (BERG ANDREAS ET AL) 1 May 2003 (2003-05-01) paragraph [0008] - paragraph [0013] paragraph [0019] - paragraph [0037] paragraph [0043] - paragraph [0055] claims 1-3,6 -----	1-60
X	US 6 240 091 B1 (GINZBOORG PHILIP ET AL) 29 May 2001 (2001-05-29) column 2, line 60 - column 3, line 23 column 5, line 16 - column 12 -----	1-60
	-/--	

[X] Further documents are listed in the continuation of Box C.

[X] See patent family annex.

* Special categories of cited documents :

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

"&" document member of the same patent family

Date of the actual completion of the international search	Date of mailing of the international search report
9 August 2006	17/08/2006

Name and mailing address of the ISA/	Authorized officer
European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Tx. 31 651 epo nl, Fax: (+31-70) 340-3016	Patlaka, E.

Form PCT/ISA/210 (second sheet) (April 2005)

INTERNATIONAL SEARCH REPORT

International application No
PCT/IB2006/001254

C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 6 865 262 B1 (MITTS H{DOT OVER (AKAN ET AL) 8 March 2005 (2005-03-08) column 2, line 1 - line 33 column 3, line 18 - column 9, line 11	1-60
A	US 2002/194143 A1 (BANERJEE DWIP N ET AL) 19 December 2002 (2002-12-19) paragraph [0009] - paragraph [0029]	1-60
A	US 5 737 414 A (WALKER ET AL) 7 April 1998 (1998-04-07) the whole document	1-60

Form PCT/ISA/210 (continuation of second sheet) (April 2005)

INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No
PCT/IB2006/001254

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
US 2004039656 A1	26-02-2004	DE 10227395 A1	24-12-2003
		EP 1372101 A2	17-12-2003
US 2003083990 A1	01-05-2003	DE 10148540 A1	24-04-2003
		EP 1298599 A1	02-04-2003
US 6240091 B1	29-05-2001	FI 972980 A	15-01-1999
US 6865262 B1	08-03-2005	AU 2443000 A	18-08-2000
		EP 1153505 A2	14-11-2001
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		WO 0045609 A2	03-08-2000
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US 5737414 A	07-04-1998	AT 324629 T	15-05-2006
		AU 5922996 A	11-12-1996
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		CA 2195968 A1	28-11-1996
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		JP 10507053 T	07-07-1998
		WO 9637848 A1	28-11-1996
		US 5949875 A	07-09-1999

Form PCT/ISA/210 (patent family annex) (April 2005)

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Large Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
Submission- Information Disclosure Stmt	1806	1	180	180
		Total in USD ($)		**180**

Electronic Acknowledgement Receipt	
EFS ID:	15860999
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	23-MAY-2013
Filing Date:	28-SEP-2011
Time Stamp:	22:00:48
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$180
RAM confirmation Number	6900
Deposit Account	505876
Authorized User	
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.16 (National application filing, search, and examination fees) Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees)	

Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees) Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees) Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037.pdf	1131972 8f7be75f51c40255540f2293df32f2fb4cf64f60	no	6
Warnings:					
Information:					
This is not an USPTO supplied IDS fillable form					
2	Non Patent Literature	4042.pdf	1394948 7bfbbfc21a7f1c00f37b612474b661a9c2b39b8b	no	8
Warnings:					
Information:					
3	Foreign Reference	WO2006120558A1Nokia.pdf	829615 8b7d3998166eaadb50492ebf5e693219d9e238ca	no	34
Warnings:					
Information:					
4	Fee Worksheet (SB06)	fee-info.pdf	30483 31870883591d633552ba9b8020d5b6614424f7d1	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	3387018		

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<u>New Applications Under 35 U.S.C. 111</u>
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

<u>National Stage of an International Application under 35 U.S.C. 371</u>
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

<u>New International Application Filed with the USPTO as a Receiving Office</u>
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

AMENDMENT AND RESPONSE

Madam:

In response to the Office Action dated January 3, 2013, the deadline for response ending on April 3, 2013, please amend the above-identified application as follows:

Amendments to the Claims begin on page 2.

Remarks begin on page 10.

AMENDMENTS TO THE CLAIMS

Without prejudice and without surrender of any subject matter, please amend the claims as follows:

1. (Currently amended) A network system for providing ~~network access service~~ **one or more** notification messages ~~containing information about an attempted or successful network access activity of~~ **associated with** an end-user device ~~communicatively coupled to the network system over a wireless access network~~, the network system comprising:

a first set of one or more elements configured to:

obtain a first ~~network access~~ notification ~~message~~ policy comprising a first ~~network access~~ trigger condition and an associated first ~~network access~~ notification message, the first ~~network access~~ trigger condition specifying a condition associated with one or more attempted or successful end-user device ~~network access~~ activities **over a wireless access network**, the first ~~network access~~ notification message comprising notification information to be presented through a user interface,

based on the first trigger condition, determine~~, based on the first network access trigger condition,~~ one or more ~~network access~~ trigger identification instructions, **the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, the second set of one or more elements being responsible for monitoring service usage over the wireless access network associated with the end-user device,**

communicate the one or more ~~network access~~ trigger identification instructions to **[[a]] the** second set of one or more elements ~~responsible for monitoring service usage associated with the end-user device~~,

receive a trigger condition indication from the second set of one or more elements, the trigger condition indication indicating that the first ~~network access~~ trigger condition has occurred, and

at least assist in presenting the notification information through the user interface**; and**

a communication interface enabling the first set of one or more elements to communicate with the second set of one or more elements,~~————————~~

~~wherein the second set of one or more elements is configured to:~~

~~execute the one or more network access trigger identification instructions to identify when the first network access trigger condition occurs, and~~

~~send the trigger condition indication to the first set of one or more elements~~.

2. (Previously presented) The network system recited in claim 1, wherein the first set of one or more elements comprises a first service design center, and further comprising a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set.

3. (Currently amended) The network system **[[of]]** **recited in** claim 2, wherein the master service design center is further configured to define a second notification policy design capability set for a second service design center, the second notification policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

4. (Currently amended) The network system recited in claim 1, wherein the first ~~network access~~ trigger condition ~~comprises~~ **is that** a period of time **has elapsed** since a previous ~~network access~~ trigger condition **occurred**, and **wherein** the notification information comprises a ~~real-time or near-real-time~~ measure of an amount ~~of service usage~~ or a cost of service usage **associated with the end-user device**.

5. (Currently amended) The network system recited in claim 1, wherein the first ~~network access~~ trigger condition ~~comprises~~ **is that the end-user device has consumed** a**[[n]]** **particular** amount of service usage, and **wherein** the notification information comprises a ~~real-time or near-real-time~~ measure of the **particular** amount of service usage ~~or an aggregate service usage~~.

6. (Currently amended) The network system recited in claim 1, wherein the user interface is a**[[n]]** **user interface of the** end-user device ~~**user interface**~~, and wherein ~~**the first set of one or more elements is configured to**~~ **at least** assist in presenting the notification information through the user interface **comprises** **[[by]]** send**[[ing]]** at least a portion of the ~~**user**~~ notification information to the end-user device.

7. (Previously presented) The network system recited in claim 1, wherein the first set of one or more elements includes a service design center hosted on an operator network.

8. (Previously presented) The network system recited in claim 1, wherein the first set of one or more elements includes a service design center hosted on an enterprise network.

9. (Currently amended) The network system recited in claim 1, wherein the first ~~**network access**~~ trigger condition ~~**comprises**~~ **is that a service usage by the end-user device has reached** a service usage limit**,** or **the end-user device has incurred** a specified amount of accrued cost.

10. (Currently amended) The network system recited in claim 1, wherein the first ~~**network access**~~ trigger condition ~~**comprises**~~ **is that a service usage by the end-user device has reached** a roaming service usage limit**,** or **the end-user device has incurred a** specified amount of accrued roaming service cost.

11. (Currently amended) The network system recited in claim **34[[1]]**, wherein the second set of one or more elements is **further** configured to classify service usage by device application, and wherein the first ~~**network access**~~ trigger condition ~~**comprises**~~ **is associated with** one or more device application access activities.

12. (Currently amended) The network system recited in claim **34[[1]]**, wherein the second set of one or more elements is **further** configured to classify service usage by network destination, and **wherein** the first ~~**network access**~~ trigger condition ~~**comprises**~~ **is associated with** one or more device network destination access activities.

13. (Previously presented) The network system recited in claim 1, wherein the second set of one or more elements comprises a service usage monitor located in a wireless operator network.

14. (Previously presented) The network system recited in claim 1, wherein the second set of one or more elements comprises a service usage monitor located in an enterprise access network.

15. (Previously presented) The network system recited in claim 1, wherein the second set of one or more elements comprises a service usage monitor located on the end-user device.

16. (Currently amended) The network system recited in claim 1, wherein the first ~~**network access**~~ notification ~~**message**~~ policy is associated with a first device group defined by a first **set** ~~**list**~~ of device credentials or a first user group defined by a first **set** ~~**list**~~ of user credentials, and wherein the first set of one or more elements is further configured to obtain a second ~~**network access**~~ notification ~~**message**~~ policy comprising a plurality of second ~~**network access**~~ trigger conditions and, for each of the plurality of second ~~**network access**~~ trigger conditions, an associated second ~~**network access**~~ notification message, the second ~~**network access**~~ notification ~~**message**~~ policy associated with a second device group defined by a second **set** ~~**list**~~ of device credentials or a second user group defined by a second **set** ~~**list**~~ of user credentials.

17. (Currently amended) The network system recited in claim 16, wherein the first ~~**network access**~~ notification ~~**message**~~ policy comprises a subset of the second ~~**network access**~~ notification ~~**message**~~ policy.

18-25. (Canceled).

26. (Currently amended) The network system recited in claim 1, wherein the first ~~**network access**~~ trigger condition ~~**comprises**~~ **is that the end-user device has consumed** a**[[n]] particular** amount of service usage.

27. (Currently amended) The network system recited in claim 1, wherein the first ~~network access~~ trigger condition ~~comprises~~ **is that the end-user device has consumed** a**[[n]]** **particular** amount of service usage on a roaming network.

28. (Currently amended) The network system recited in claim 1, wherein the first ~~network access~~ trigger condition is that the **end-user** device is connected to or is attempting to connect to a roaming network.

29. (Currently amended) The network system recited in claim 1, wherein the first set of one or more elements **comprises** ~~includes one or more of:~~ a service design center, a network provisioning translator, ~~and~~ a provisioning element**, or a combination of these**.

30. (Currently amended) The network system recited in claim 1, wherein ~~the first set of one or more elements is configured to assist in presenting the notification information through~~ the user interface ~~by presenting the notification information through~~ **is** a service design center user interface.

31. (Currently amended) The network system recited in claim 1, wherein the first ~~network access~~ trigger condition ~~comprises~~ **is that the end-user device has incurred** a cost of service usage, and the notification information comprises a ~~real-time or near-real-time~~ measure of the cost of service usage or an aggregate service usage cost.

32. (Currently amended) The network system recited in claim **34[[1]]**, wherein the second set of one or more elements is further configured to block or to assist in blocking one or more communications associated with the end-user device after the first ~~network access~~ trigger condition has occurred.

33. (Currently amended) The network system recited in claim **34[[1]]**, wherein the second set of one or more elements is further configured to restrict or to assist in restricting one or more communications associated with the end-user device after the first ~~network access~~ trigger condition has occurred.

34. (New) The network system recited in claim 1, further comprising the second set of one or more elements, and wherein the second set of one or more elements is configured to:

execute the one or more trigger identification instructions to identify when the first trigger condition occurs, and

send the trigger condition indication to the first set of one or more elements.

35. (New) The network system recited in claim 34, wherein the second set of one or more elements comprises a usage accounting server, a firewall, a gateway, a deep packet inspection element, a home agent, or a combination of these.

36. (New) The network system recited in claim 1, wherein the notification information comprises information about a data usage.

37. (New) The network system recited in claim 1, wherein the notification information comprises information about a status of the end-user device.

38. (New) The network system recited in claim 1, wherein the notification information comprises real-time or near-real-time information about a data usage associated with the end-user device.

39. (New) The network system recited in claim 1, wherein the notification information comprises information about a data usage availability.

40. (New) The network system recited in claim 1, wherein the notification information comprises information about a data usage entitlement.

41. (New) The network system recited in claim 1, wherein the notification information comprises a report of usage.

42. (New) The network system recited in claim 41, wherein the report of usage provides information about usage associated with a user, a user group, the end-user device, a device group, a location, or a combination of these.

43. (New) The network system recited in claim 1, wherein the first trigger condition is that the one or more attempted or successful end-user device network access activities indicate a network access pattern.

44. (New) The network system recited in claim 43, wherein the network access pattern is associated with a particular application on the end-user device.

45. (New) The network system recited in claim 43, wherein the network access pattern is associated with one or more network destinations, websites, or network servers.

46. (New) The network system recited in claim 43, wherein the notification information comprises information about the network access pattern.

47. (New) The network system recited in claim 43, wherein the notification information comprises information that the network access pattern has occurred.

48. (New) The network system recited in claim 1, wherein the user interface is an end-user device user interface.

49. (New) The network system recited in claim 1, wherein the trigger condition is that the end-user device attempted an activity that requires a service plan to be activated or purchased.

50. (New) The network system recited in claim 1, wherein the user interface is an end-user device user interface, and wherein the first set of one or more elements is further configured to obtain, from the end-user device, a response to the notification information.

51. (New) The network system recited in claim 50, wherein the response comprises a request to activate or purchase a service plan for the end-user device.

52. (New) The network system recited in claim 51, wherein the first set of one or more elements is further configured to at least assist in activating the service plan for the end-user device.

53. (New) The network system recited in claim 1, wherein the first set of one or more elements comprises a billing system, a gateway, a home agent, a service plan provisioning system, or a combination of these.

54. (New) The network system recited in claim 1, wherein the notification information comprises a warning.

55. (New) The network system recited in claim 1, wherein the notification information comprises an indication that an attempted activity is not allowed.

REMARKS

Claims 1-17 and 26-33 are pending and were rejected. Claims 1, 3-6, 9-12, 16, 17, and 26-33 are being amended. Claims 34-55 are being added. No new matter is being added. Applicants respectfully request reconsideration.

Claim Rejections – 35 U.S.C. § 103

In Section 3, the Office Action rejects claims 1-17 and 26-33 under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 7,873,344 to Bowser *et al.* (hereinafter, "Bowser").

Bowser discloses a system and method to enable efficient distribution of public warning information using a network infrastructure. Bowser at Abstract. Bowser explains that the Public Alert system provides warnings about hazardous conditions, such as significant weather events (*e.g.*, flooding, avalanches, blizzards, hurricanes, etc.), 911 outages, power outages, and other hazards. *Id.* at col. 3, l. 66 – col. 4, l. 25. Bowser states that Public Alert signals may not be detectable from within a building or structure, and that it is impractical to expect every person within a building to own a Public Alert receiver. *Id.* at col. 1, ll. 20-23.

Thus, Bowser proposes an apparatus (hereinafter, the "alerting device") that receives a wireless emergency broadcast and transmits, to a group of subscribers over a local area network (LAN), a message responsive to the wireless emergency broadcast. *Id.* at col. 2, l. 66 – col. 3, l. 1. Specifically, Bowser discloses an alerting device that has a wireless receiver configured to receive an emergency transmission via an antenna. *Id.* at col. 5, ll. 26-29. The alerting device processes the emergency transmission and sends an alert to computing devices over the LAN. *Id.* at col. 5, ll. 45-47. The alert may include data and digitized audio based on the received emergency transmission, or it could be an e-mail alert, an instant message alert, a pager alert, or an unattended intercom alert. *Id.* at col. 5, ll. 47-58. The alerting device also has a local device interface that enables the ability to inject local hazard information, such as fire, security threat, or other, directly into the system for distribution to clients. *Id.* at col. 5, ll. 58-62.

Computing devices receiving the alert can display an alert responsive to the broadcast sent by the alerting device, and/or they can provide an audible indication. *Id.* at col. 6, ll. 12-17.

Bowser discloses that the alerting device and/or the computing devices can send keep-alive or heartbeat messages to each other to enable detection of whether the alerting device and the computing devices are in communication. *Id.* at col. 6, ll. 18-21.

In rejecting claims 1-17 and 26-33, the Office Action states that Bowser discloses, in Figures 1-7 and related text, a network system (*e.g.*, 106, 422); an end user device having an interface (*e.g.*, 424, 712, 714); a trigger condition (*e.g.*, 502); a notification policy (*e.g.*, 504); and presenting a timed alert message based upon the trigger condition (*e.g.*, 510, 610). Office Action at 2. The Office Action states that Bowser does not specifically disclose a second set of elements and a master policy with amount of usage and accrued cost, but Bowser discloses multiple devices and a policy to entertain trigger conditions over a period of real-time. *Id.* at 2-3. The Office Action takes Official Notice that multiple devices responding to a master policy have been commonplace in the emergency alert system art, and that policies attendant to a policy directed to an amount of usage and accrued cost have been common knowledge in the art. *Id.* at 3. The Office Action asserts that to have provided a second set of elements and master policy dealing with an amount of usage and accrued cost for Bowser would have been obvious to one of ordinary skill in the art, in view of the Official Notice. *Id.*

Claim 1

As amended, claim 1 recites:

> A network system for providing one or more notification messages associated with an end-user device, the network system comprising:
>
> a first set of one or more elements configured to:
>
> obtain a first notification policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, the first notification message comprising notification information to be presented through a user interface,
>
> based on the first trigger condition, determine one or more trigger identification instructions, the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, the second set of one or more elements being responsible

for monitoring service usage over the wireless access network associated with the end-user device,

communicate the one or more trigger identification instructions to the second set of one or more elements,

receive a trigger condition indication from the second set of one or more elements, the trigger condition indication indicating that the first trigger condition has occurred, and

at least assist in presenting the notification information through the user interface; and

a communication interface enabling the first set of one or more elements to communicate with the second set of one or more elements.

Applicants respectfully submit that claim 1 is nonobvious in view of Bowser because Bowser fails to disclose or render obvious at least "a first set of one or more elements configured to obtain a first notification policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, the first notification message comprising notification information to be presented through a user interface," "a first set of one or more elements configured to . . . based on the first trigger condition, determine one or more trigger identification instructions, the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, the second set of one or more elements being responsible for monitoring service usage over the wireless access network associated with the end-user device," and "a first set of one or more elements configured to . . . communicate the one or more trigger identification instructions to the second set of one or more elements."

"a first set of one or more elements configured to obtain a first notification policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, the first notification message comprising notification information to be presented through a user interface"

Applicants respectfully submit that Bowser does not disclose or render obvious "a first set of one or more elements configured to obtain a first notification policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, the first notification message comprising notification information to be presented through a user interface" at least because Bowser does not disclose any element that obtains a first notification policy comprising a first trigger condition and an associated first notification message. Although Bowser discloses that after receiving an emergency transmission, the alerting device looks up a policy for responding to the emergency transmission, the policy described in Bowser simply specifies actions people should take in response to the alert: "For example, for a tornado a policy can be stored that informs users on the associated network to go to the lowest level of the structure, or pre-designated areas." Bowser at col. 10, ll. 30-36; col. 7, l. 66 – col. 8, l. 4. Even if the policy described by Bowser specifies a notification message, the policy does not also comprise a trigger condition, much less a trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network. Indeed, Bowser nowhere discloses a policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, the first notification message comprising notification information to be presented through a user interface. Therefore, for at least this reason, Applicants respectfully submit that claim 1 is patentable over Bowser.

"a first set of one or more elements configured to . . . based on the first trigger condition, determine one or more trigger identification instructions, the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, the second set of one or more

elements being responsible for monitoring service usage over the wireless access network associated with the end-user device"

Because Bowser does not disclose or render obvious a first set of one or more elements configured to obtain a first notification policy comprising a first trigger condition and an associated first notification message, the first trigger condition specifying a condition associated with one or more attempted or successful end-user device activities over a wireless access network, it follows that Bowser also does not disclose or render obvious "a first set of one or more elements configured to . . . *based on the first trigger condition*, determine one or more trigger identification instructions, the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, the second set of one or more elements being responsible for monitoring service usage over the wireless access network associated with the end-user device."

Moreover, Bowser does not disclose or contemplate a second set of one or more elements responsible for monitoring service usage over the wireless access network associated with the end-user device. The computing devices described in Bowser merely receive alerts from the alerting device; Bowser does not disclose that the computing devices are responsible for monitoring any service usage, much less service usage over the wireless access network. Therefore, for at least these additional reasons, Applicants respectfully submit that claim 1 is patentable over Bowser.

"a first set of one or more elements configured to . . . communicate the one or more trigger identification instructions to the second set of one or more elements"

Because Bowser does not disclose or render obvious a first set of one or more elements configured to, based on the first trigger condition, determine one or more trigger identification instructions, the one or more trigger identification instructions configured to assist a second set of one or more elements in identifying when the first trigger condition occurs, it follows that Bowser also does not disclose or render obvious "a first set of one or more elements configured to . . . communicate the one or more trigger identification instructions to the second set of one or more elements." Although Bowser discloses that the alerting device sends alerts to the computing devices, these alerts are not "trigger identification instructions configured to assist a

second set of one or more elements in identifying when the first trigger condition occurs." Therefore, for at least these additional reasons, Applicants respectfully submit that claim 1 is patentable over Bowser.

Claims 2-17 and 26-55

Claims 2-17 and 26-55 depend, directly or indirectly, from claim 1. Because claim 1 is patentable over Bowser, Applicants respectfully submit that claims 2-17 and 26-55 are also patentable over Bowser.

Support for New Claims

The paragraph numbers provided below are the paragraph numbers of the as-filed specification, which may not match the paragraph numbers of the published application.

Claim 34 is supported at least by as-filed claim 1. Claim 35 is supported at least by paragraphs [0050] and [0095]. Claims 36-42 are supported at least by paragraph [0085]. Claims 43-47 are supported at least by paragraph [0095]. Claim 48 is supported at least by paragraph [0084]. Claim 49 is supported at least by paragraph [0057]. Claims 50-53 are supported at least by paragraph [0079]. Claims 54 and 55 are supported at least by paragraph [0152].

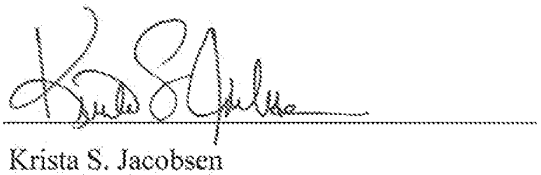
CONCLUSION

Applicants respectfully request entry of these amendments as provided herein. The application is believed to be in condition for allowance, and a Notice of Allowance is hereby respectfully requested. If the Examiner has any questions or needs any additional information, the Examiner is invited to contact the undersigned.

The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

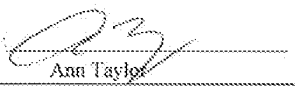
Date: April 2, 2013

By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

CERTIFICATE OF ELECTRONIC TRANSMISSION

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Ann Taylor

Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]

Filed as Small Entity

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Claims in excess of 20	2202	22	40	880
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
			Total in USD ($)	**880**

Electronic Acknowledgement Receipt	
EFS ID:	15416438
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	02-APR-2013
Filing Date:	28-SEP-2011
Time Stamp:	20:38:35
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$880
RAM confirmation Number	6183
Deposit Account	505876
Authorized User	
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Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees) Charge any Additional Fees required under 37 C.F.R. Section 1.20 (Post Issuance fees) Charge any Additional Fees required under 37 C.F.R. Section 1.21 (Miscellaneous fees and charges)

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1		P037OAR.pdf	238782 da7c42a790585fd544bb8776f946aa06bc8ffccb	yes	16

	Multipart Description/PDF files in .zip description		
	Document Description	**Start**	**End**
	Amendment/Req. Reconsideration-After Non-Final Reject	1	1
	Claims	2	9
	Applicant Arguments/Remarks Made in an Amendment	10	16

Warnings:					
Information:					
2	Fee Worksheet (SB06)	fee-info.pdf	30446 1096ac7cf7ef925b364eccee422ffb67730f180d	no	2
Warnings:					
Information:					
		Total Files Size (in bytes):	269228		

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If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

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PATENT APPLICATION FEE DETERMINATION RECORD Substitute for Form PTO-875	Application or Docket Number 13/248,028	Filing Date 09/28/2011	☐ To be Mailed

ENTITY: ☐ LARGE ☒ SMALL ☐ MICRO

APPLICATION AS FILED – PART I

FOR	(Column 1) NUMBER FILED	(Column 2) NUMBER EXTRA	RATE ($)	FEE ($)
☐ BASIC FEE (37 CFR 1.16(a), (b), or (c))	N/A	N/A	N/A	
☐ SEARCH FEE (37 CFR 1.16(k), (i), or (m))	N/A	N/A	N/A	
☐ EXAMINATION FEE (37 CFR 1.16(o), (p), or (q))	N/A	N/A	N/A	
TOTAL CLAIMS (37 CFR 1.16(i))	minus 20 =	*	X $ =	
INDEPENDENT CLAIMS (37 CFR 1.16(h))	minus 3 =	*	X $ =	
☐ APPLICATION SIZE FEE (37 CFR 1.16(s))	If the specification and drawings exceed 100 sheets of paper, the application size fee due is $310 ($155 for small entity) for each additional 50 sheets or fraction thereof. See 35 U.S.C. 41(a)(1)(G) and 37 CFR 1.16(s).			
☐ MULTIPLE DEPENDENT CLAIM PRESENT (37 CFR 1.16(j))				
* If the difference in column 1 is less than zero, enter "0" in column 2.			TOTAL	

APPLICATION AS AMENDED – PART II

AMENDMENT 04/02/2013

	(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	RATE ($)	ADDITIONAL FEE ($)
Total (37 CFR 1.16(i))	* 47	Minus	** 25	= 22	X $40 =	880
Independent (37 CFR 1.16(h))	* 1	Minus	***4	= 0	X $210 =	0
☐ Application Size Fee (37 CFR 1.16(s))						
☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))						
					TOTAL ADD'L FEE	880

AMENDMENT

	(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	RATE ($)	ADDITIONAL FEE ($)
Total (37 CFR 1.16(i))	*	Minus	**	=	X $ =	
Independent (37 CFR 1.16(h))	*	Minus	***	=	X $ =	
☐ Application Size Fee (37 CFR 1.16(s))						
☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))						
					TOTAL ADD'L FEE	

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.
** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".
*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".
The "Highest Number Previously Paid For" (Total or Independent) is the highest number found in the appropriate box in column 1.

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/TRINA STEPTOE/

This collection of information is required by 37 CFR 1.16. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**
If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8135388		2012-03-13	Gailloux, Michael A. et al.	
	2	6947723		2005-09-20	Gurnani, Roger et al.	
	3	8350700		2013-01-08	Fast, Raymond D. et al.	
	4	8204190		2012-06-19	Bang, Jung-Hee et al.	
	5	7962622		2011-06-14	Friend, John et al.	
	6	7583964		2009-09-01	Wong, Gregory A.	
	7	7565141		2009-07-21	Macaluso, Anthony G.	
	8	7373179		2008-05-13	Stine, Ted et al.	

EFS Web 2.1.17

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7236780		2007-06-26	Benco, David S. et al.	
	10	7039403		2006-05-02	Wong, Gregory A.	
	11	7865182		2011-01-04	Macaluso, Anthony G.	
	12	8370477		2013-02-05	Short, Joel E. et al.	
	13	8364806		2013-01-29	Short, Joel E. et al.	
	14	8279067		2012-10-02	Berger, Thomas R. et al.	
	15	8213296		2012-07-03	Shannon, Frank M. et al.	
	16	8019868		2011-09-13	Rao, Goutham et al.	
	17	8005988		2011-08-23	Maes, Stephane H.	
	18	7978627		2011-07-12	Taylor, William Scott et al.	
	19	7711848		2010-05-04	Maes, Stephane H.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	6782412		2004-08-24	Brophy, Kevin et al.	
	21	6081591		2000-06-27	Skoog, Frederick H.	
	22	6064878		2000-05-16	Denker, John Stewart et al.	
	23	7730123		2010-06-01	Erickson, Richard R. et al.	
	24	8024397		2011-09-20	Erickson, Richard R. et al.	
	25	8156206		2012-04-10	Kiley, Kevin J. et al.	
	26	8126722		2012-02-28	Robb, Terence Alan et al.	
	27	8315594		2012-11-20	MAUSER, Edward Ronald et al.	
	28	8353001		2013-01-08	HERROD, Allan	
	29	8195093		2013-06-05	GARRETT, Darrin et al.	
	30	8036600		2011-10-11	GARRETT, Darrin et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	31	8364089		2013-01-29	PHILLIPS, Derek	
	32	8335161		2012-12-18	FOOTTIT, Tom et al.	
	33	8301513		2012-10-30	PENG, Shih-Ta et al.	
	34	8230061		2012-07-24	HASSAN, Amer A. et al.	
	35	8204794		2012-06-19	PENG, Shih-Ta et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20090299857		2009-12-03	Brubaker, Curtis M.	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] j	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
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NON-PATENT LITERATURE DOCUMENTS

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☒ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

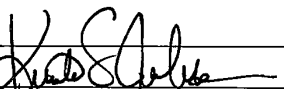
☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-03-21
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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Electronic Acknowledgement Receipt	
EFS ID:	15332544
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	22-MAR-2013
Filing Date:	28-SEP-2011
Time Stamp:	14:46:38
Application Type:	Utility under 35 USC 111(a)

Payment information:

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File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	1179983 b89421d59e69b907ef28d6671c4754e5fb9ceef0	no	6

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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

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U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	8291238		2012-10-16	Ginter, Karl L. et al.	
	2	8068824		2011-11-29	Shan, Xueshan et al.	
	3	7228354		2007-06-05	Chambliss, David Darden et al.	
	4	5283904		1994-02-01	Carson, David G. et al.	
	5	8208919		2012-06-26	Kotecha, Lalit Ratilal	
	6	8185152		2012-05-22	Goldner, Alla	
	7	7844728		2010-11-30	Anderson, Thomas W. et al.	
	8	8094551		2012-01-10	Huber, Kurt Donald et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7970350		2011-06-28	Sheynman, Arnold et al.	
	10	7948952		2011-05-24	Hurtta, Tuija et al.	
	11	7957020		2011-06-07	Mine, Ryuta et al.	
	12	7346410		2008-03-18	Uchiyama, Kenji	
	13	7167078		2007-01-23	Pourchot, Shawn C.	
	14	8102814		2012-01-24	Rahman, Shahriar I. et al.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20090307746		2009-12-10	DI, Jinwen et al.	
	2	20050009499		2005-01-13	Koster, Karl	
	3	20100041364		2010-02-18	Lott, Robert Wayne et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	4	20100027469		2010-02-04	Gurajala, Ravindra Babu et al.	
	5	20010053694		2001-12-20	Igarashi, Yoichiro et al.	

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FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1							☐

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NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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EXAMINER SIGNATURE

Examiner Signature		Date Considered	

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[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

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	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☒ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

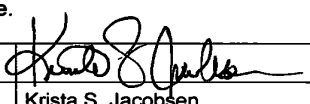
☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2013-01-22
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Electronic Acknowledgement Receipt

EFS ID:	14764201
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	22-JAN-2013
Filing Date:	28-SEP-2011
Time Stamp:	21:51:09
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	884962 450664464b0bd5d93ea9ad93554f69125f781f09	no	4

Warnings:	
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This is not an USPTO supplied IDS fillable form	
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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 01/03/2013

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	

ART UNIT	PAPER NUMBER
3687	

NOTIFICATION DATE	DELIVERY MODE
01/03/2013	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patent@headwaterllc.com

Office Action Summary	Application No.	Applicant(s)	
	13/248,028	RALEIGH ET AL.	
	Examiner	Art Unit	
	ANDREW JOSEPH RUDY	3687	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *22 October 2012*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.

4)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

5)☒ Claim(s) *1-17 and 26-33* is/are pending in the application.

5a) Of the above claim(s) _____ is/are withdrawn from consideration.

6)☐ Claim(s) _____ is/are allowed.

7)☒ Claim(s) *1-17 and 26-33* is/are rejected.

8)☐ Claim(s) _____ is/are objected to.

9)☐ Claim(s) _____ are subject to restriction and/or election requirement.

* If any claims have been determined allowable, you may be eligible to benefit from the **Patent Prosecution Highway** program at a participating intellectual property office for the corresponding application. For more information, please see http://www.uspto.gov/patents/init_events/pph/index.jsp or send an inquiry to PPHfeedback@uspto.gov.

Application Papers

10)☐ The specification is objected to by the Examiner.

11)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.

3) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .

4) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Applicant's election without traverse of Group I, Claims 1-17, in the reply filed on October 22, 2012 is acknowledged. Applicant's October 22, 2012 Amendments and REMARKS have been reviewed. Claims 26-33 have been added and are part of Group I. Claims 18-25 have been cancelled.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1-17 and 26-33 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bowser et al., US 7,873,344.

Bowser discloses, e.g. Figs. 1-7 and related text, a network system, e.g. 106, 422, an end user device having an interface, e.g. 424, 712, 714, a trigger condition, e.g. 502, a notification policy, e.g. 504, and presenting a timed alert message based upon the trigger condition, e.g. 510, 610. Bowser does not specifically disclose a second set of elements and a master policy with amount of usage and accrued cost. However, Bowser discloses multiple devices and a policy to entertain trigger conditions over a

period of real-time. Official Notice is taken that multiple devices responding to a master policy have been common place in the emergency alert system art. Further, policies attendant to a policy directed to an amount of usage and accrued cost have been common knowledge in the art. To have provided a second set of elements and a master policy dealing with an amount of usage and accrued cost for Bowser would have been obvious to one of ordinary skill in the art, in view of Official Notice.

4. Further pertinent references of interest are noted on the attached PTO-892.

5. Applicant's Information Disclosure Statements (IDS's) submitted April 17, 2012; May 11, 2012; August 14, 2012; October 10, 2012 and November 30, 2012 have been reviewed. Note the attached IDS's.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW JOSEPH RUDY whose telephone number is (571)272-6789. The examiner can normally be reached on Monday thru Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew S. Gart can be reached on 571-272-3955. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ANDREW JOSEPH RUDY/

Primary Examiner, Art Unit 3687

Notice of References Cited	Application/Control No. 13/248,028	Applicant(s)/Patent Under Reexamination RALEIGH ET AL.	
	Examiner ANDREW JOSEPH RUDY	Art Unit 3687	Page 1 of 1

U.S. PATENT DOCUMENTS

*		Document Number Country Code-Number-Kind Code	Date MM-YYYY	Name	Classification
*	A	US-7,873,344	01-2011	Bowser et al.	455/404.1
*	B	US-7,856,226	12-2010	Wong et al.	455/414.1
*	C	US-2009/0326636	12-2009	Hashimoto et al.	623/1.15
	D	US-			
	E	US-			
	F	US-			
	G	US-			
	H	US-			
	I	US-			
	J	US-			
	K	US-			
	L	US-			
	M	US-			

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	N					
	O					
	P					
	Q					
	R					
	S					
	T					

NON-PATENT DOCUMENTS

*		Include as applicable: Author, Title Date, Publisher, Edition or Volume, Pertinent Pages)
	U	
	V	
	W	
	X	

*A copy of this reference is not being furnished with this Office action. (See MPEP § 707.05(a).)
Dates in MM-YYYY format are publication dates. Classifications may be US or foreign.

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G. et al.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6418147		2002-07-09	Wiedeman, Robert A	
	2	6574465		2003-06-03	Marsh, William et al.	
	3	6765864		2004-07-20	Natarajan, Shankar et al.	
	4	7366497		2008-04-29	Nagata, Hideaki	
	5	7388950		2008-06-17	Elsey, Nicholas J. et al.	
	6	7450927		2008-11-11	Creswell, Carroll W. et al.	
	7	7499537		2009-03-03	Elsey, Nicholas J. et al.	
	8	7610328		2009-10-27	Haase, Oliver et al.	

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /A.R./

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7650137		2010-01-19	Jobs, Steven P. et al.	
	10	7693720		2010-04-06	Kennewick, Robert A. et al.	
	11	7734784		2010-06-08	Araujo, Wladimir et al.	
	12	7747699		2010-06-29	Prueitt, James K. et al.	
	13	7792708		2010-09-07	Alva, Jessi	
	14	7797401		2010-09-14	Stewart, Hugh Donal et al.	
	15	7822837		2010-10-26	Urban, Mark et al.	
	16	7949529		2011-05-24	Weider, Chris et al.	
	17	8095666		2012-01-10	Schmidt, Jonathan E. et al.	
	18	8099077		2012-01-17	Chowdhury, Amor et al.	
	19	8099517		2012-01-17	Jia, Lujun R. et al.	

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8170553		2012-05-01	Bennett, James D.	
	21	7984130		2011-07-19	Bogineni, Kalyani et al.	
	22	8019687		2011-09-13	Wang, Feng Chi et al.	
	23	8144591		2012-03-27	Ghai, Rajat et al.	
	24	7336960		2008-02-26	Zavalkovsky, Arthur et al.	
	25	8194549		2012-06-05	Huber, Kurt Donald et al.	
	26	6606744		2003-08-12	Mikurak, Michael G.	
	27	8190675		2012-05-29	Tribbett, David	
	28	8200775		2012-06-12	Moore, James F.	
	29	7069248		2006-06-27	Huber, Adriano	

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U.S.PATENT APPLICATION PUBLICATIONS

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Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20030018524		2003-01-23	Fishman, Dan et al.	
	2	20030046396		2003-03-06	Richter, Roger K.	
	3	20030220984		2003-11-27	Jones, Paul David et al.	
	4	20040021697		2004-02-05	Beaton, Brian Finlay et al.	
	5	20040107360		2004-06-03	Herrmann, Conrad K. et al.	
	6	20070061243		2007-03-15	Ramer, Jorey et al.	
	7	20070282896		2007-12-06	Wydroug, Zoe M. et al.	
	8	20080184127		2008-07-31	Rafey, Richter A. et al.	
	9	20090013157		2009-01-08	Beaule, Stephane	
	10	20090079699		2009-03-26	SUN, JIAN	

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	Attorney Docket Number	RALEP037

	11	20110126141		2011-05-26	King, Bennett M. et al.	
	12	20100227632		2010-09-09	Bell, Kris M. et al.	
	13	20100103820		2010-04-29	Fuller, Randy et al.	
	14	20070254675		2007-11-01	Zorlu Ozer, Sebnem et al.	
	15	20080005285		2008-01-03	Robinson, James David et al.	
	16	20090113514		2009-04-30	Hu, Q. James	

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FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
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Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]

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	1		☐

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EXAMINER SIGNATURE

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

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Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U.S.PATENTS						Remove
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	5794142		1998-08-11	VANTTILA et al.	
	2	5903845		1999-05-11	BUHRMANN et al.	
	3	5933778		1999-08-03	BUHRMANN et al.	
	4	6317584		2001-11-13	ABU-AMARA et al.	
	5	6829596		2004-12-07	FRAZEE, Steve	
	6	7024200		2006-04-04	McKENNA et al.	
	7	8023425		2011-09-20	RALEIGH, Gregory G.	
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	Examiner Name	Joon H. Hwang
	Attorney Docket Number	26WV-160514 [RALEP037]

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
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Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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CONFIRMATION NO. 8510

SERIAL NUMBER	FILING or 371(c) DATE	CLASS	GROUP ART UNIT	ATTORNEY DOCKET NO.
13/248,028	09/28/2011 RULE	705	3687	RALEP037 [26WV-160514]

APPLICANTS

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

**** CONTINUING DATA ***************************

This application is a CIP of 12/380,757 03/02/2009 PAT 8,326,958
and is a CIP of 13/134,005 05/25/2011
and is a CIP of 13/134,028 05/25/2011
and is a CIP of 13/229,580 09/09/2011
and is a CIP of 13/237,827 09/20/2011
and is a CIP of 13/239,321 09/21/2011
and claims benefit of 61/387,243 09/28/2010
and claims benefit of 61/387,247 09/28/2010
and claims benefit of 61/389,547 10/04/2010
and claims benefit of 61/407,358 10/27/2010
and claims benefit of 61/418,507 12/01/2010
and claims benefit of 61/418,509 12/01/2010
and claims benefit of 61/420,727 12/07/2010
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and claims benefit of 61/422,572 12/13/2010
and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

**** FOREIGN APPLICATIONS ***************************

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10/14/2011

Foreign Priority claimed ☐ Yes ☑ No 35 USC 119(a-d) conditions met ☐ Yes ☑ No Verified and Acknowledged /ANDREW JOSEPH RUDY/ Examiner's Signature	☐ Met after Allowance Initials	STATE OR COUNTRY	SHEETS DRAWINGS	TOTAL CLAIMS	INDEPENDENT CLAIMS
		CA	28	25	4

ADDRESS

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
UNITED STATES

TITLE

Enterprise Access Control and Accounting Allocation for Access Networks

		☐ All Fees
		☐ 1.16 Fees (Filing)

BIB (Rev. 05/07).

Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

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	Attorney Docket Number	RALEP037

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Doc code: IDS
Doc description: Information Disclosure Statement (IDS) Filed

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	Attorney Docket Number	RALEP037

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	Attorney Docket Number	RALEP037

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	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 1 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F03	EP 1772988 A1	04-11-2007	Huawei Technologies Co., LTD.		

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Sheet 2 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		6,658,254	12-02-2003	PURDY et al.	
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		6,725,031	04-20-2004	WATLER et al	
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Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]
	F04	EP 1978772 A1	10-08-2008	British Telecomm. Public Ltd. Co.		
	F05	WO 1999/065185 A3	12-16-1999	British Telecomm. Public Ltd. Co.		
	F06	WO 2003/014891 A2	02-20-2003	The Boeing Company		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 3 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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		7,245,901	07-17-2007	McGREGOR et al	
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	F07	WO 2003/058880 A1	07-17-2003	Telia AB		
	F08	WO 2004/028070 A1	04-01-2004	Credant Technologies, Inc.		
	F09	WO 2004/077797 A2	09-10-2004	Boston Comm. Group, Inc.		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 4 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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		7,574,731	08-11-2009	FASCENDA, Anthony C.	
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	F10	WO 2004/095753 A2	11-04-2004	Motorola Inc.		
	F11	WO 2006/004467 A1	01-12-2006	Telefonaktiebolaget LM Ericsson		
	F12	WO 2006/050758 A1	05-18-2006	Telefonaktiebolaget LM Ericsson		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 5 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F13	WO 2006/073837 A2	07-13-2006	Symbol Technologies, Inc.		
	F14	WO 2006/077481 A1	07-27-2006	TrueContext Corporation		
	F15	WO 2006/130960 A1	12-14-2006	Mobidia, Inc.		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 6 of 17

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Application Number	13/248,028
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Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F16	WO 2007/001833 A2	01-04-2007	Symbol Technologies, Inc.		
	F17	WO 2007/014630 A1	02-08-2007	Telefonaktiebolaget LM Ericsson		
	F18	WO 2007/018363 A1	02-15-2007	Upresto, Inc.		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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		2005/0055291	03-10-2005	BEVENTE et al	
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	F19	WO 2007/053848 A1	05-10-2007	Mobile Armor, LLC		
	F20	WO 2007/069245 A2	06-21-2007	Yoggie Sec. Systems, Inc.		
	F21	WO 2007/107701 A2	09-27-2007	British Telecomm. Public Ltd. Co.		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 8 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
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		2006/0040642	02-23-2006	BORIS et al	
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	F22	WO 2008/017837 A1	02-14-2008	Symbian Software Limited		
	F23	WO 2008/051379 A2	05-02-2008	Verizon Services Corp.		
	F24	WO 2008/066419 A1	06-05-2008	Telefonaktiebolaget LM Ericsson		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 9 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F27	WO 2008/099802 A1	08-21-2008	NEC Corporation		

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 10 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
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	F28	WO 2010/088413 A1	08-05-2010	Headwater Partners I LLC		

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Sheet 11 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
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Art Unit	2447
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Attorney Docket Number	26WV-160514 [RALEP037]

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Sheet 12 of 17

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Filing Date	September 28, 2011
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Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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		2010/0192170	07-29-2010	RALEIGH, Gregory G.	

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] *(if known)*	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 14 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		2010/0192212	07-29-2010	RALEIGH, Gregory G.	
		2010/0195503	08-05-2010	RALEIGH, Gregory G.	
		2010/0197268	08-05-2010	RALEIGH, Gregory G., et al	
		2010/0198698	08-05-2010	RALEIGH, Gregory G., et al	
		2010/0198939	08-05-2010	RALEIGH, Gregory G., et al	
		2010/0325420	12-23-2010	KANEKAR	

FOREIGN PATENT DOCUMENTS

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Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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Sheet 15 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
	N01	Author Unknown, 3GPP TS 23.203, V8.4.0, 3rd Generation Partnership Project; Technical Specification Group Services and System Aspects; Policy and Charging Control Architecture (Release 8), December 2008	
	N02	Author Unknown, 3GPP TS 23.401, V8.4.0, 3rd Generation Partnership Project; Technical Specification Group Services and System Aspects; General Packer Radio Service (GPRS) Enhancements for Evolved Universal Terrestrial Radio Access Network (E-UTRAN) Access (Release 8), December 2008	
	N03	Author Unknown, "Overview of GSM, GPRS, and UMTS," Chapter 2, November 4, 2008	
	N04	Author Unknown, Hewlett-Packard, "IP Multimedia Services Charging," a White Paper from HP, January 2006	
	N05	Author Unknown, Kindle™ User's Guide 3rd Edition, Copyright 2004-2009	
	N06	No author/date indicated. "Data Roaming Tariffs - Transparency Measures." Obtained from EUROPA - Europe's Information Society Thematic Portal website, June 24, 2011: "http://ec.europa.eu/information_society/activities/roaming/data/measures/index_en.htm."	
	N07	ALONISTIOTI et al., "Intelligent Architectures Enabling Flexible Service Provision and Adaptability," 2002	
	N08	CHANDRASEKHAR et al., "Femtocell Networks: A Survey," June 28, 2008	
	N09	CHAOUCHI et al., "Policy Based Networking in the Integration Effort of 4G Networks and Services," 2004 IEEE	
	N10	DIKAIAKOS et al., "A Distributed Middleware Infrastructure for Personalized Services," November 24, 2003	

Examiner Signature	/Andrew Joseph Rudy/	Date Considered	12/26/2012

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	N11	FAROOQ et al., "An IEEE 802.16 WiMax Module for the NS-3 Simulator," March 2-6, 2009	
	N12	HAN et al., "Information Collection Services for Qos-Aware Mobile Applications," 2005	
	N13	HARTMANN et al., "Agent-Based Banking Transactions & Information Retrieval - What About Performance Issues?" 1999	
	N14	HOSSAIN et al., "Gain-Based Selection of Ambient Media Services in Pervasive Environments," Mobile Networks and Applications. 03 October 2008	
	N15	LI, Yu, "Dedicated E-Reading Device: The State of the Art and The Challenges," Scroll, Vol. 1, No. 1, 2008	
	N16	KNIGHT et al., "Layer 2 and 3 Virtual Private Networks: Taxonomy, Technology, and Standarization Efforts," IEEE Communications Magazine, June 2004	
	N17	KOUTSOPOULOU et al., "Middleware Platform for the Support of Charging Reconfiguration Actions," 2005	
	N18	KYRIAKAKOS et al., "Ubiquitous Service Provision in Next Generation Mobile Networks," Proceedings of the 13th IST Mobile and Wireless Communications Summit, Lyon, France, June 2004	
	N19	NILSSON et al., "A Novel MAC Scheme for Solving the QoS Parameter Adjustment Problem in IEEE802.11e EDCA," February 2006	
	N20	OPPLIGER, Rolf, "Internet Security: Firewalls and Bey," Communications of the ACM, May 1997, Vol. 40. No. 5	

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Sheet 17 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
	N21	RAO et al., "Evolution of Mobile Location-Based Services," Communication of the ACM, December 2003	
	N22	STEGLICH, Stephan, "I-Centric User Interaction," November 21, 2003	
	N23	VAN EIJK, et al., "GigaMobile, Agent Technology for Designing Personalized Mobile Service Brokerage," July 1, 2002	
	N24	ZHU et al., "A Survey of Quality of Service in IEEE 802.11 Networks," IEEE Wireless Communications, August 2004	
	N25	Search Report and Written Opinion mailed 17 January 2012 from International Serial Number PCT/US2011/001683 filed 28 September 2011	

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Search Notes	Application/Control No.	Applicant(s)/Patent under Reexamination
	13/248,028	RALEIGH ET AL.
	Examiner	Art Unit
	ANDREW JOSEPH RUDY	3687

SEARCHED			
Class	Subclass	Date	Examiner
709	203,216, 219,223 225,226, 238	12/26/2012	AJR
370	230,289	12/26/2012	AJR
370	312,313	12/26/2012	AJR
726	1,4	12/26/2012	AJR
705	30,34	12/26/2012	AJR

INTERFERENCE SEARCHED			
Class	Subclass	Date	Examiner

SEARCH NOTES (INCLUDING SEARCH STRATEGY)		
	DATE	EXMR
Continuity data reviewed.	12/26/2012	AJR
Inventor name search conducted.	12/26/2012	AJR
Bibliographic data sheet updated.	12/26/2012	AJR

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Amendment
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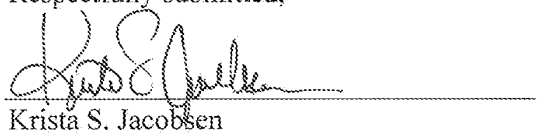
SUBMISSION OF FORMAL DRAWINGS

Sir:

To improve drawing quality, please replace the originally filed drawing sheets with the twenty-eight (28) replacement drawing sheets submitted herewith. The replacement drawing sheets, which fully comply with 37 CFR §§ 1.84 and 1.121(d), contain no substantive changes and introduce no new matter.

If the Examiner has any questions or needs any additional information, the Examiner is invited to contact the undersigned. The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

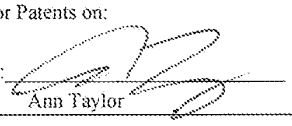
Respectfully submitted,

Date: November 30, 2012 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
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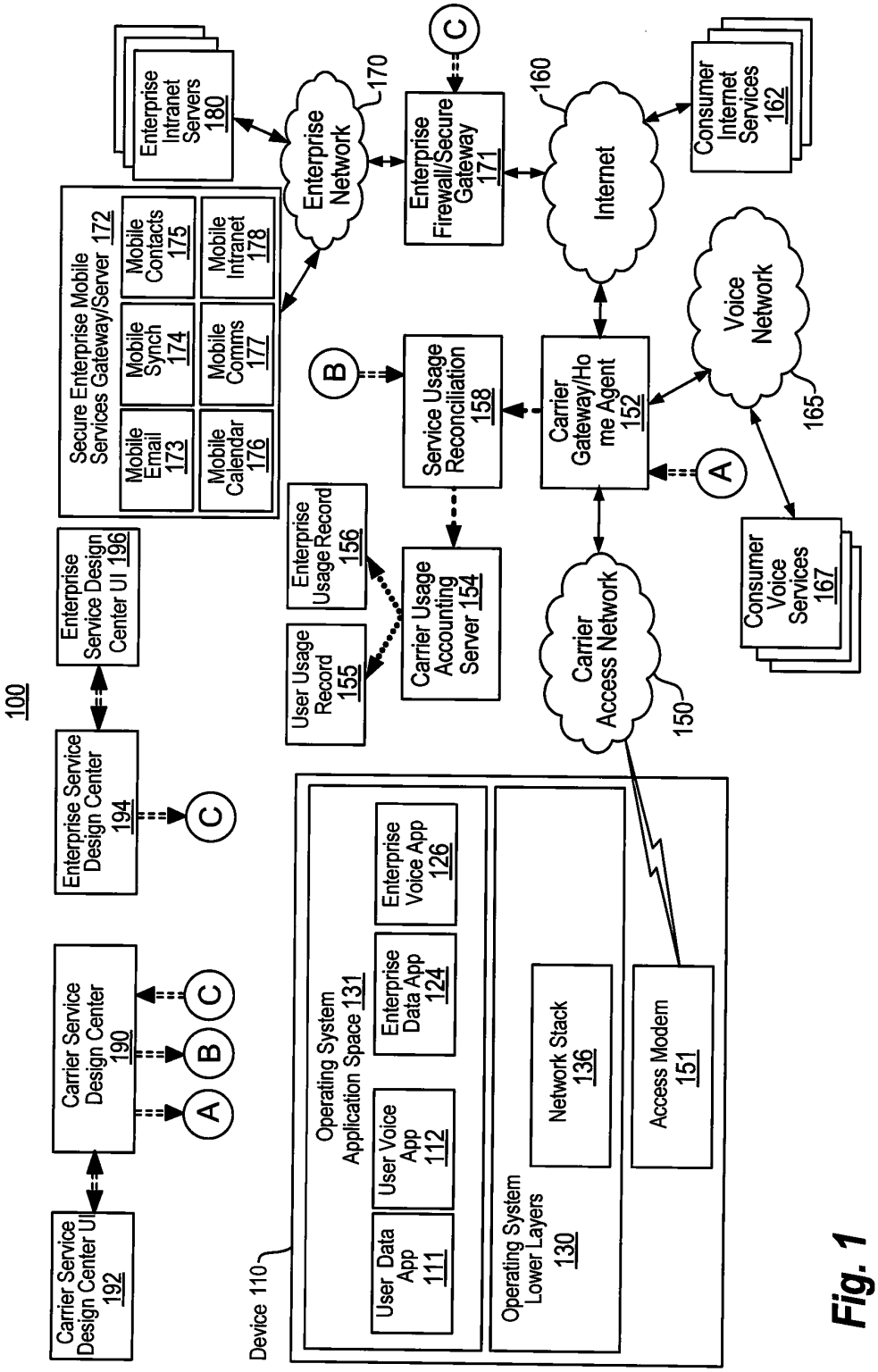

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Fig. 1

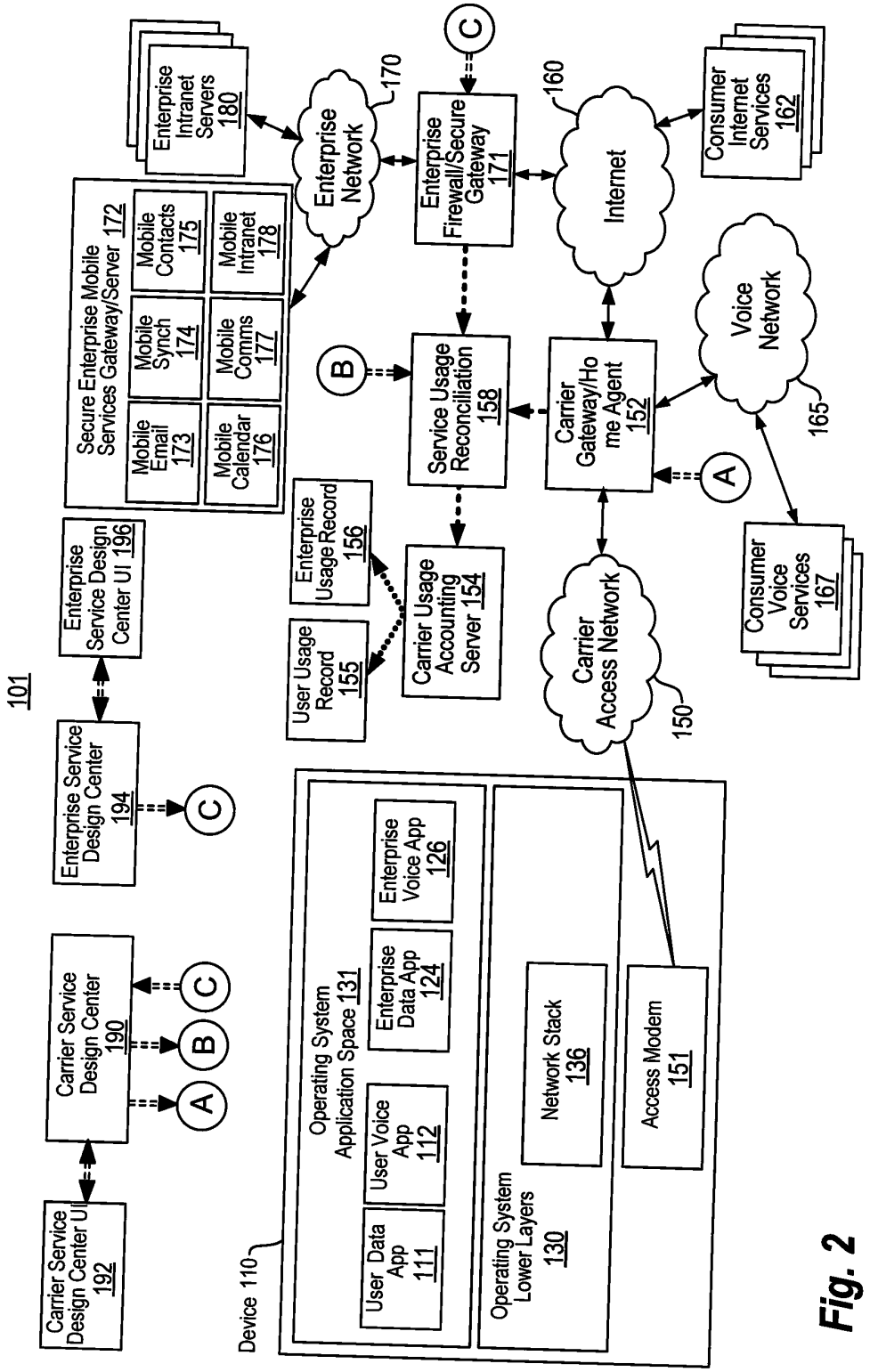

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User Data App 111
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Enterprise Network 170
Enterprise Intranet Servers 180
Enterprise Firewall/Secure Gateway 171
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Voice Network 165
Consumer Voice Services 167

Fig. 2

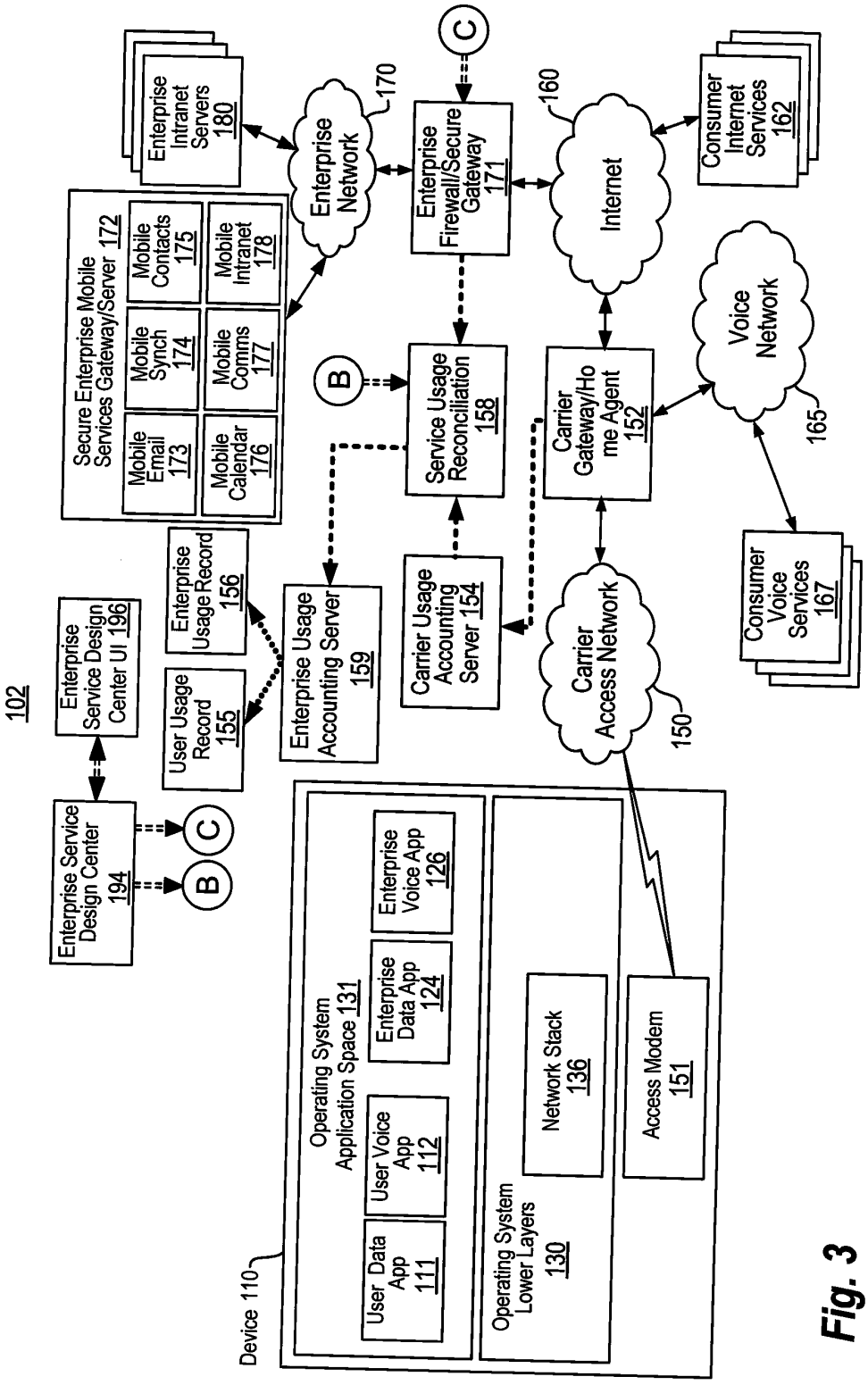

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Fig. 3

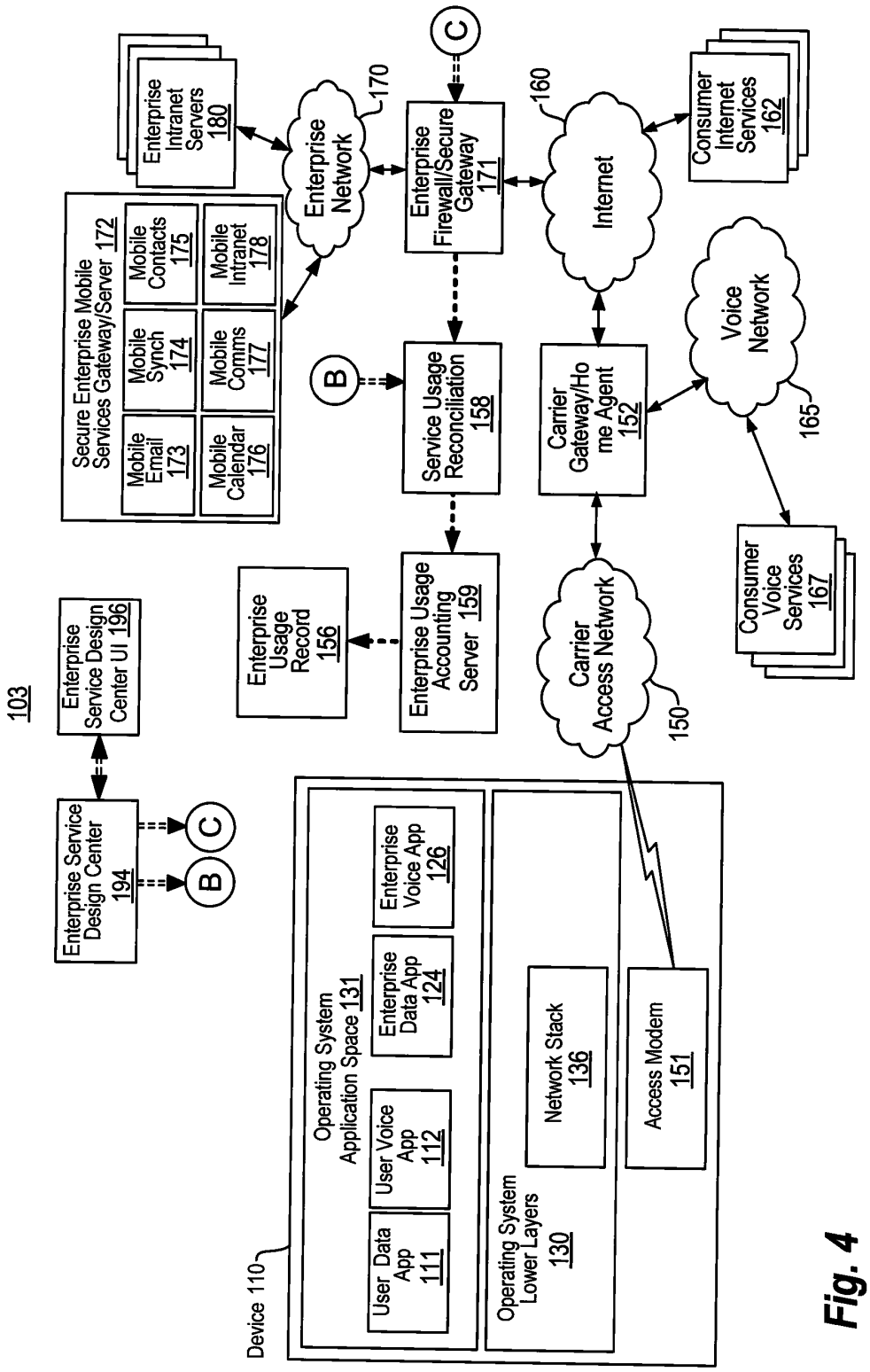

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Fig. 4

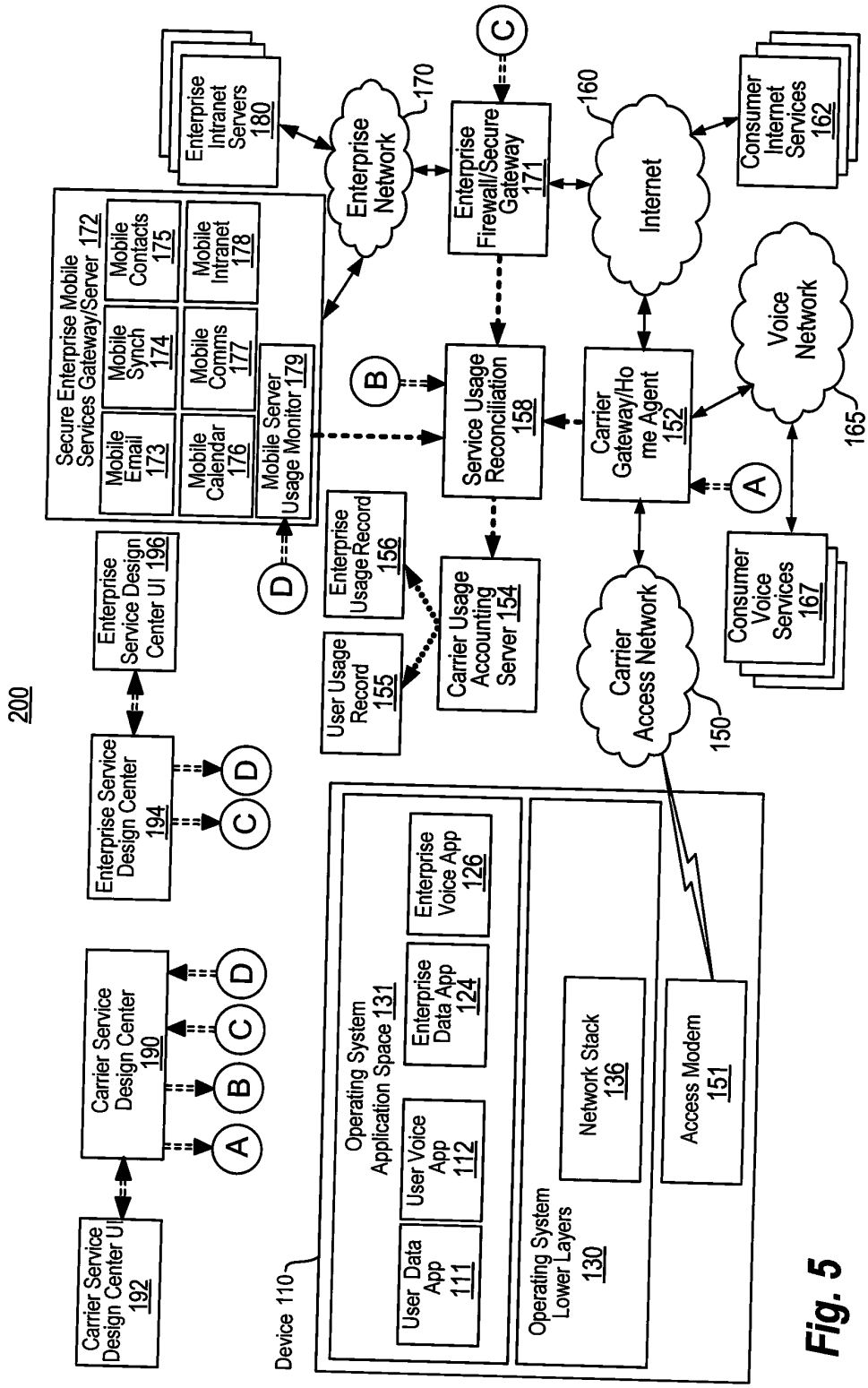

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User Voice App 112
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Fig. 5

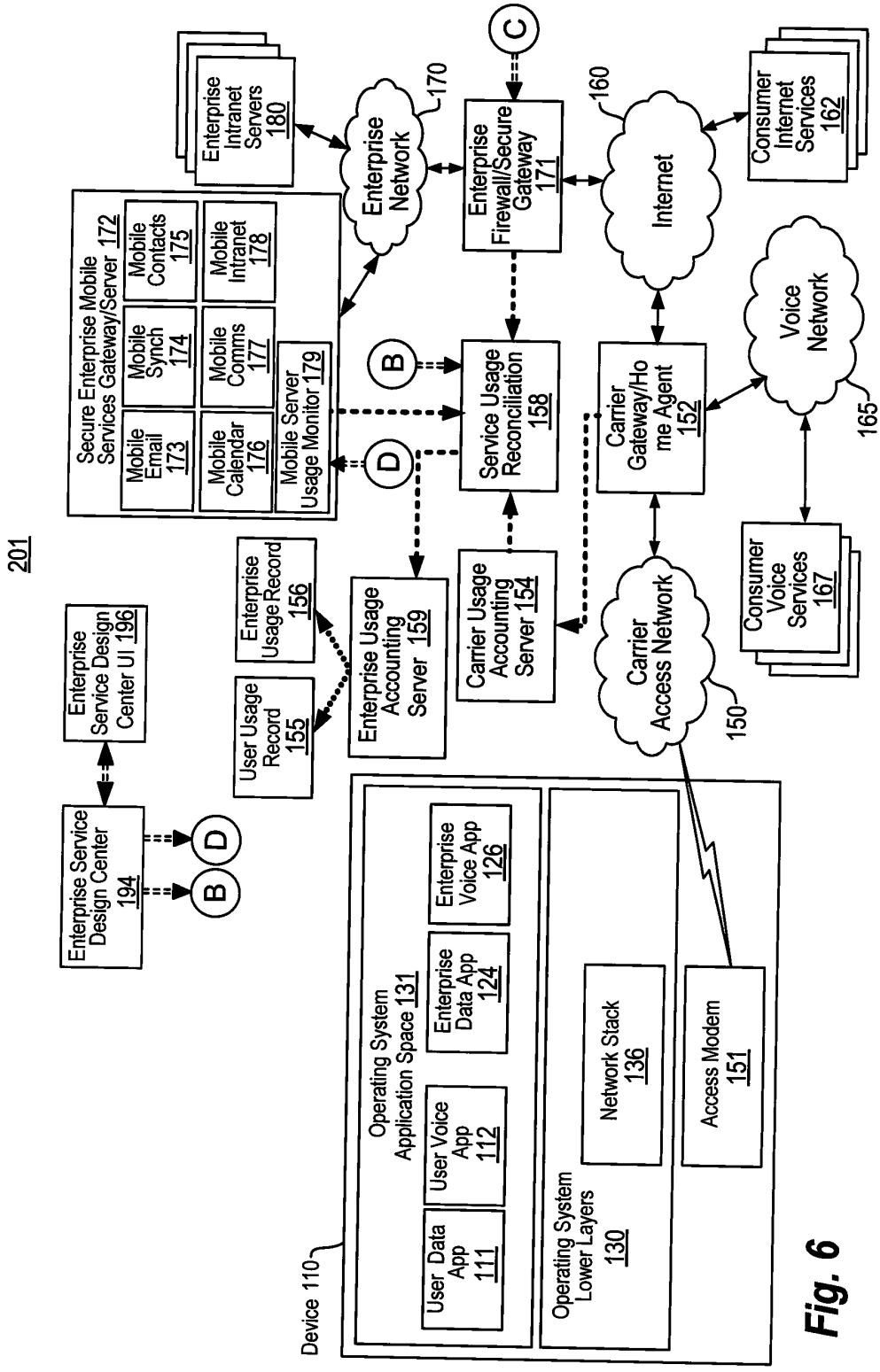

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User Voice App 112
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Fig. 6

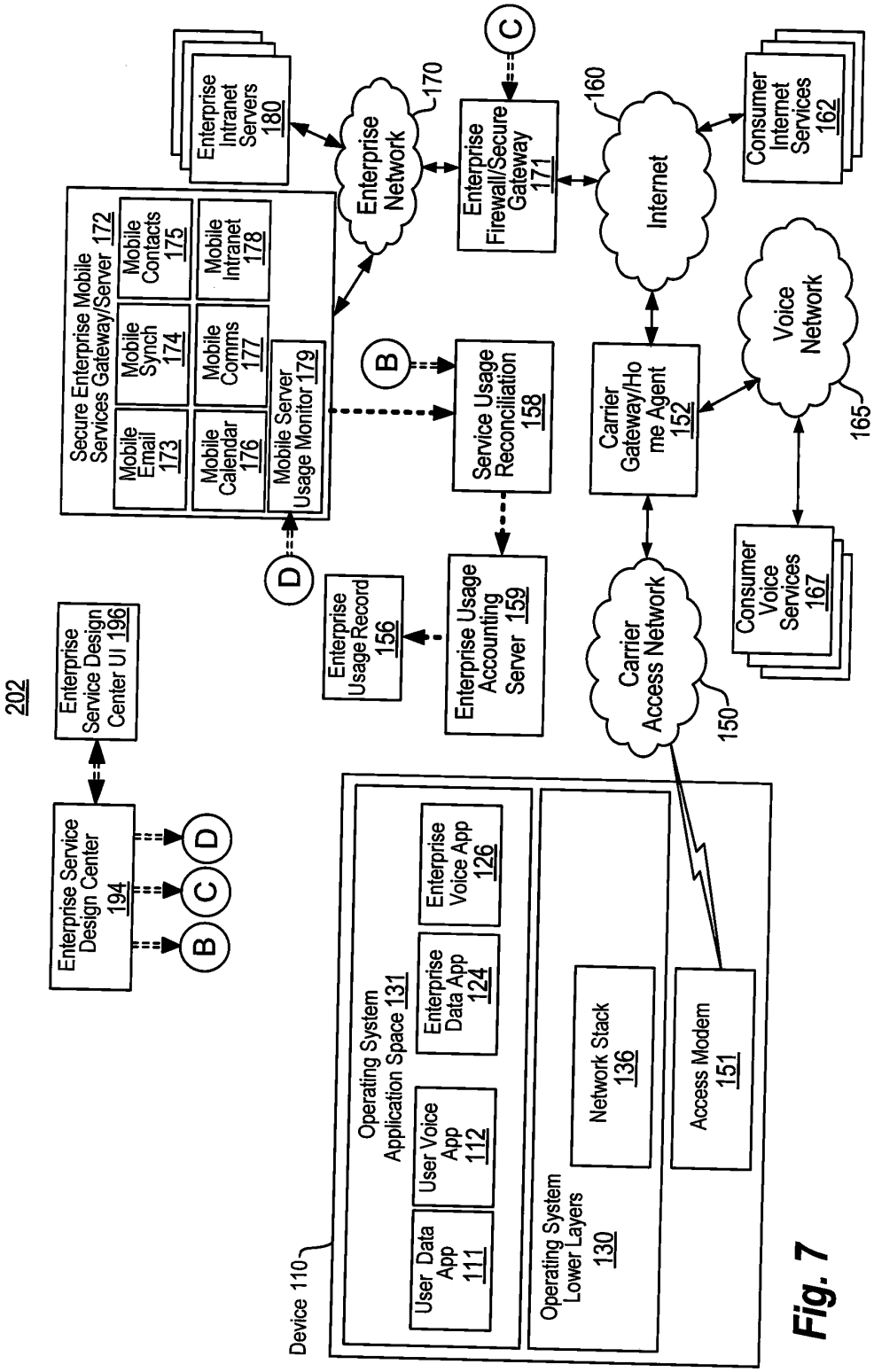

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Enterprise Network
170
Enterprise Firewall/Secure Gateway 171
Internet
160
Carrier Gateway/Home Agent 152
Voice Network
165
Consumer Internet Services 162
Consumer Voice Services 167

Fig. 7

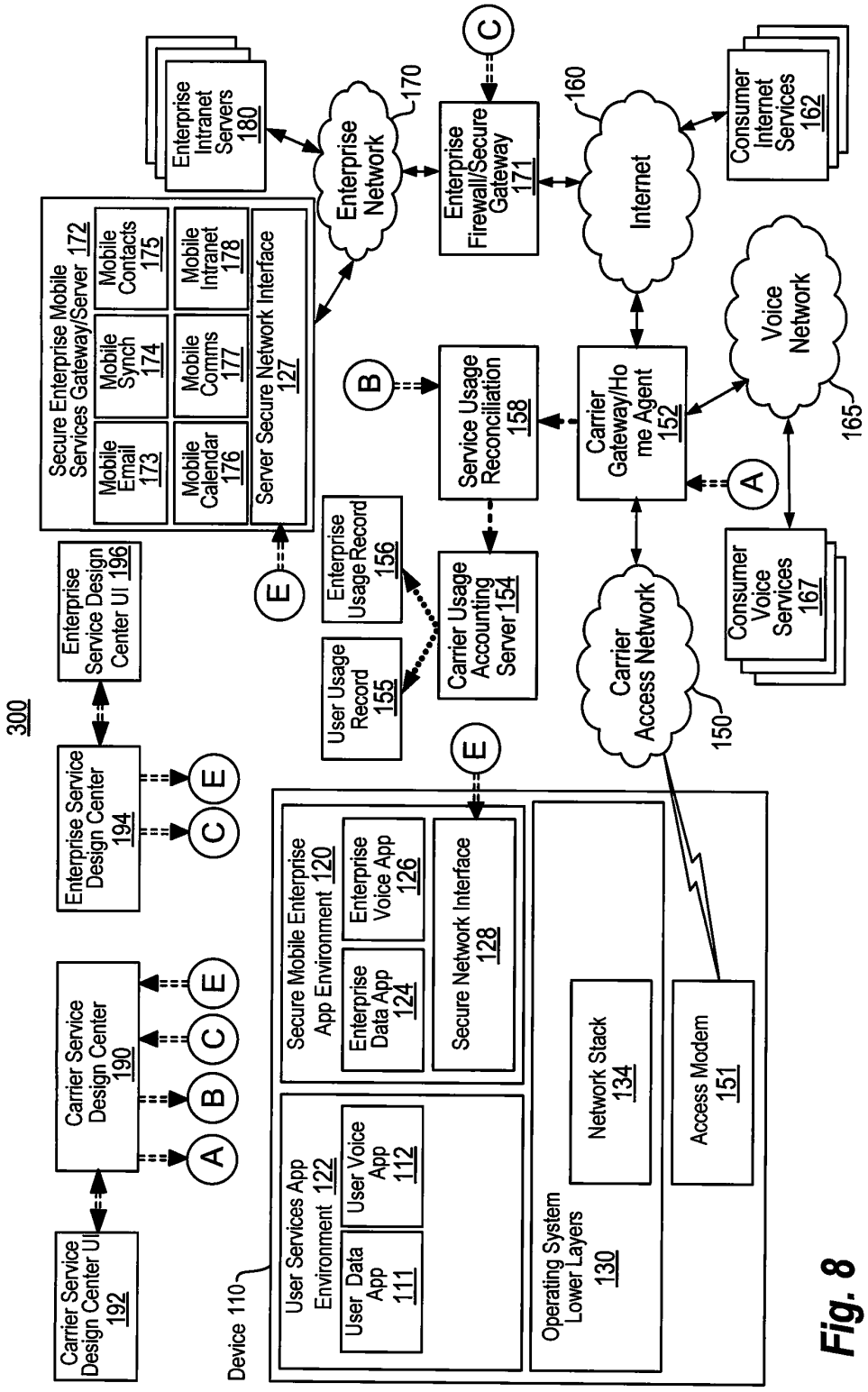

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Carrier Service Design Center 190
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Enterprise Service Design Center 194
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User Data App 111
User Voice App 112
Secure Mobile Enterprise App Environment 120
Enterprise Data App 124
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Enterprise Network 170
Enterprise Firewall/Secure Gateway 171
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Carrier Gateway/Home Agent 152
Service Usage Reconciliation 158
Enterprise Usage Record 156
User Usage Record 155
Carrier Usage Accounting Server 154
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Fig. 8

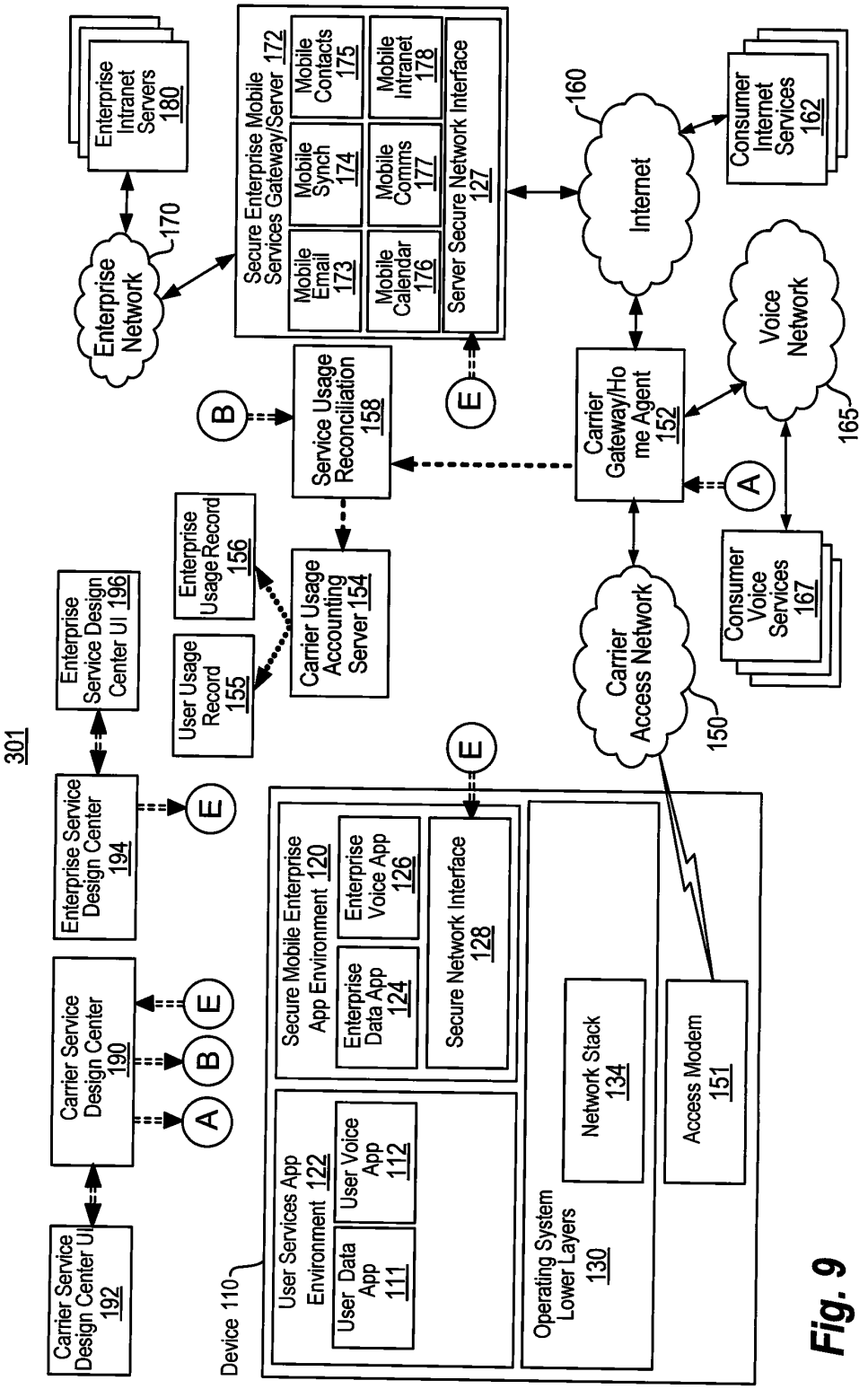

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Mobile Contacts 175
Mobile Calendar 176
Mobile Comms 177
Mobile Intranet 178
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Secure Mobile Enterprise App Environment 120
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Enterprise Voice App 126
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Fig. 9

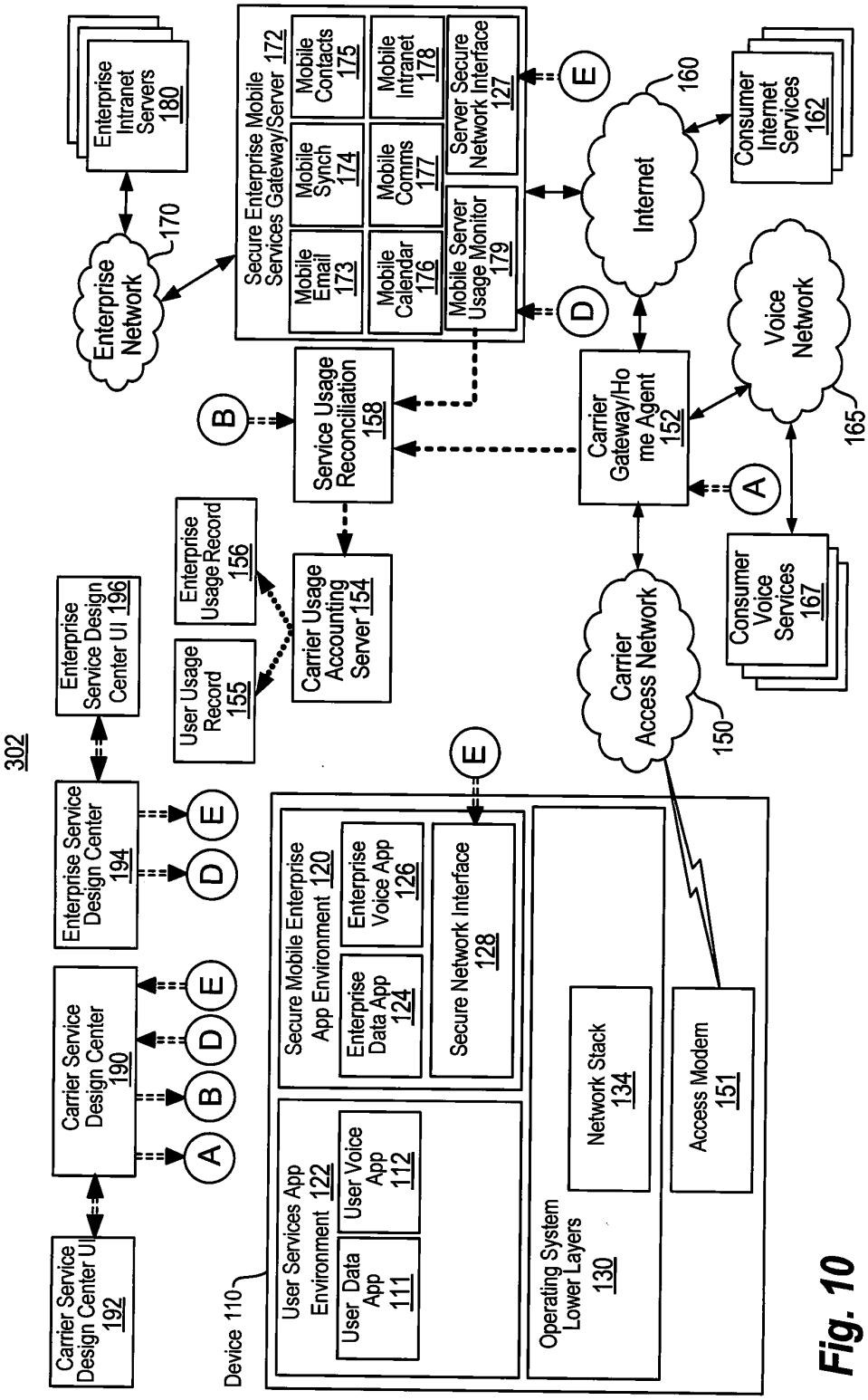

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Enterprise Service Design Center 194
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Carrier Service Design Center UI 192
A
B
D
E
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User Usage Record 155
Carrier Usage Accounting Server 154
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Enterprise Intranet Servers 180
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Enterprise Voice App 126
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Operating System Lower Layers 130
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Fig. 10

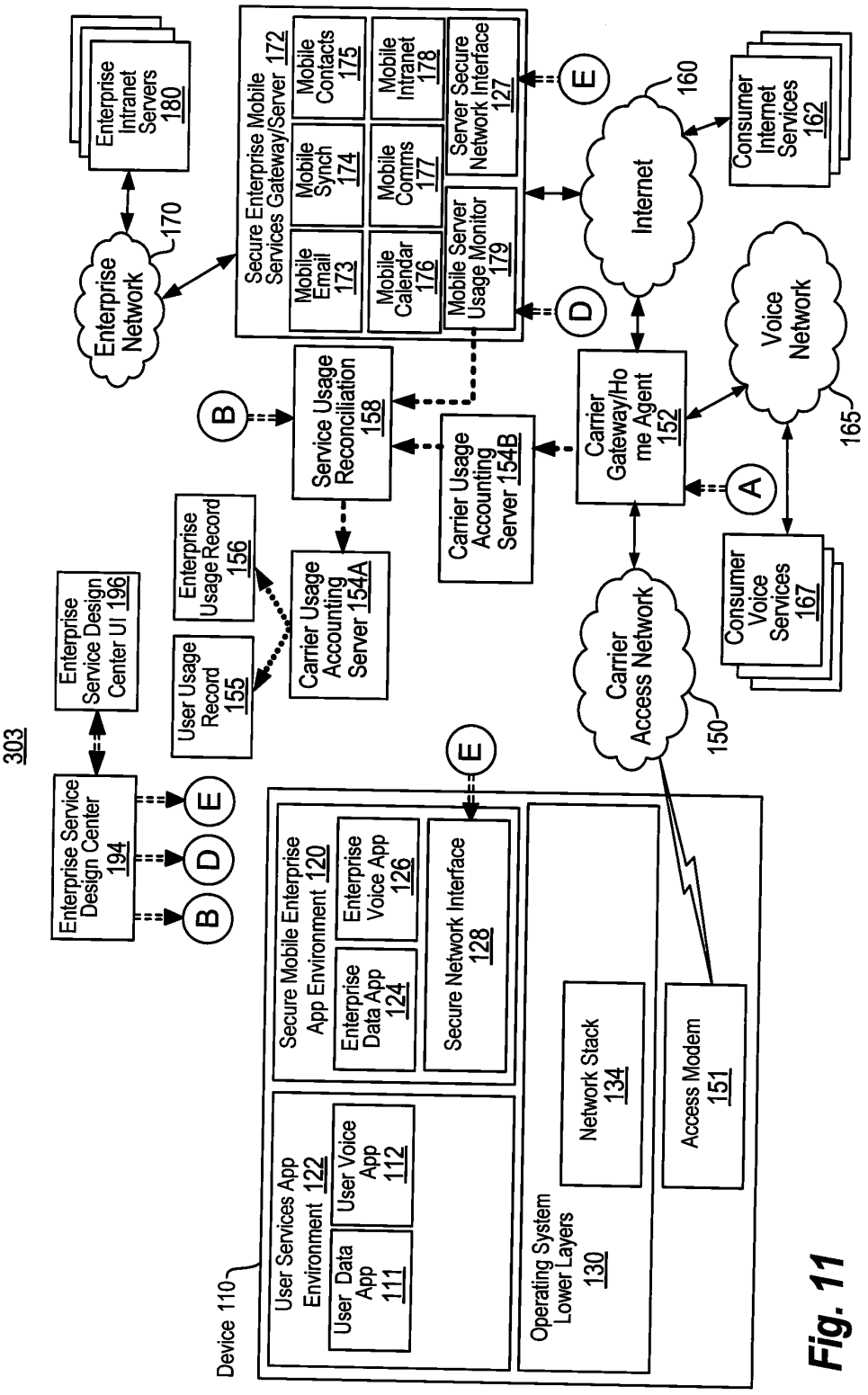

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User Voice App 112
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Enterprise Voice App 126
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Carrier Usage Accounting Server 154A
Service Usage Reconciliation 158
Carrier Usage Accounting Server 154B
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Mobile Calendar 176
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Carrier Access Network 150
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Voice Network 165
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Fig. 11

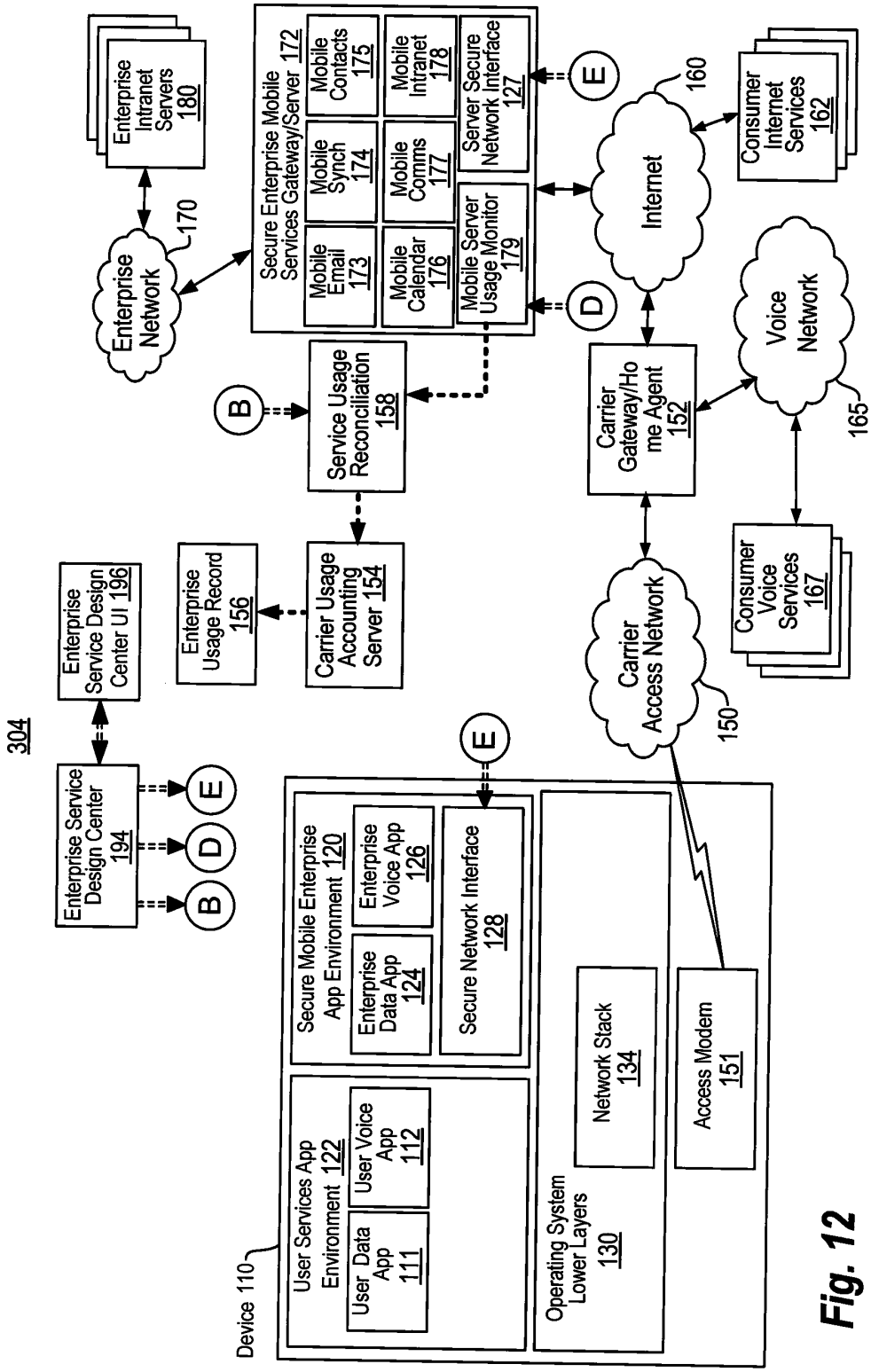

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Enterprise Service Design Center UI 196
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D
E
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User Voice App 112
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Mobile Intranet 178
Mobile Server Usage Monitor 179
Server Secure Network Interface 127
Carrier Gateway/Home Agent 152
Internet 160
Consumer Internet Services 162
Voice Network 165
Consumer Voice Services 167

Fig. 12

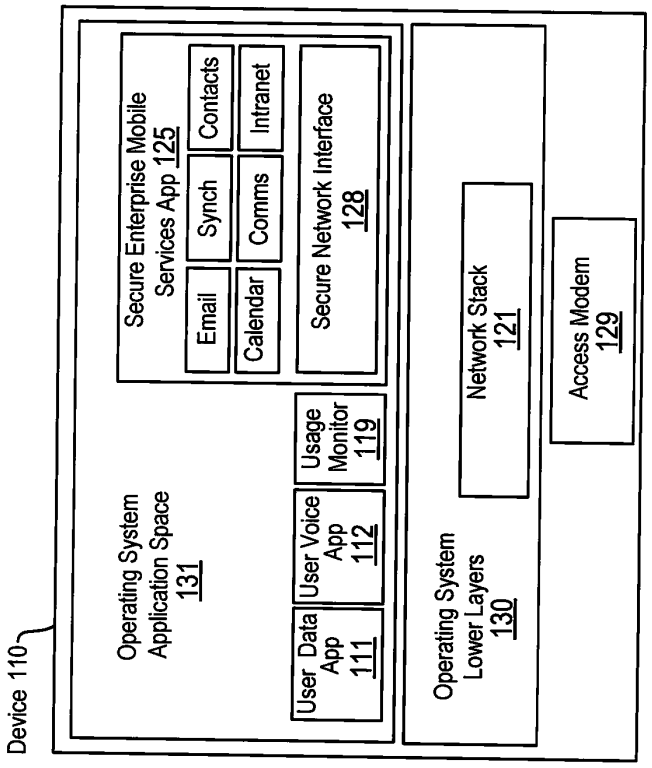

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Operating System Application Space 131
User Data App 111
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Usage Monitor 119
Secure Enterprise Mobile Services App 125
Email
Calendar
Synch
Comms
Contacts
Intranet
Secure Network Interface 128
Operating System Lower Layers 130
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Fig. 13

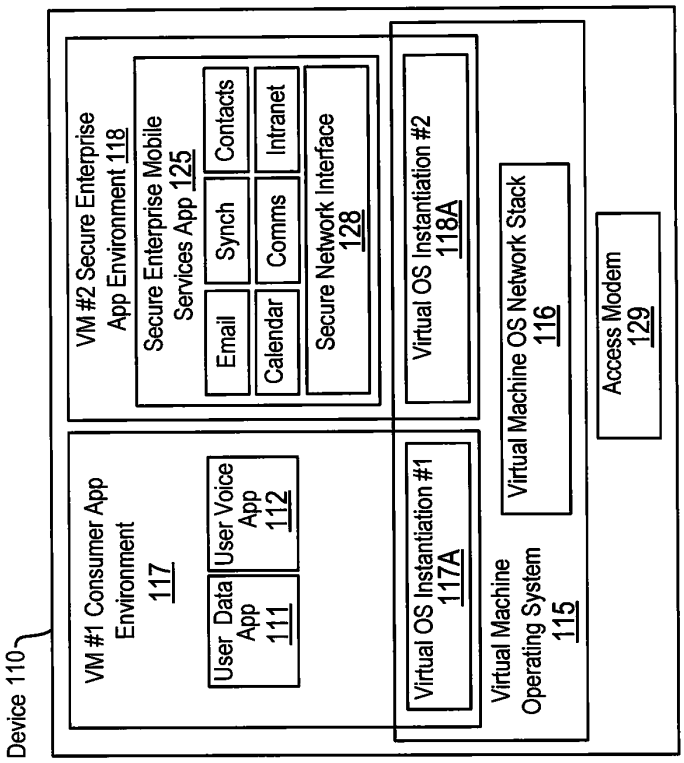

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VM #2 Secure Enterprise App Environment 118
Secure Enterprise Mobile Services App 125
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Comms
Contacts
Intranet
Secure Network Interface 128
Virtual OS Instantiation #1 117A
Virtual OS Instantiation #2 118A
Virtual Machine Operating System 115
Virtual Machine OS Network Stack 116
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Fig. 14

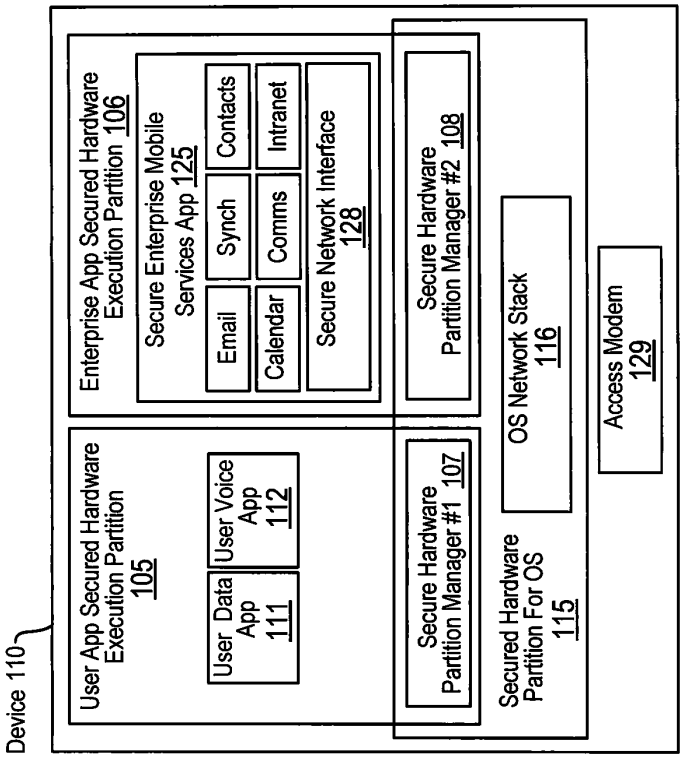

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User Voice App 112
Enterprise App Secured Hardware Execution Partition 106
Secure Enterprise Mobile Services App 125
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Synch
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Secure Network Interface 128
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Secure Hardware Partition Manager #1 107
OS Network Stack 116
Secured Hardware Partition For OS 115
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Fig. 15

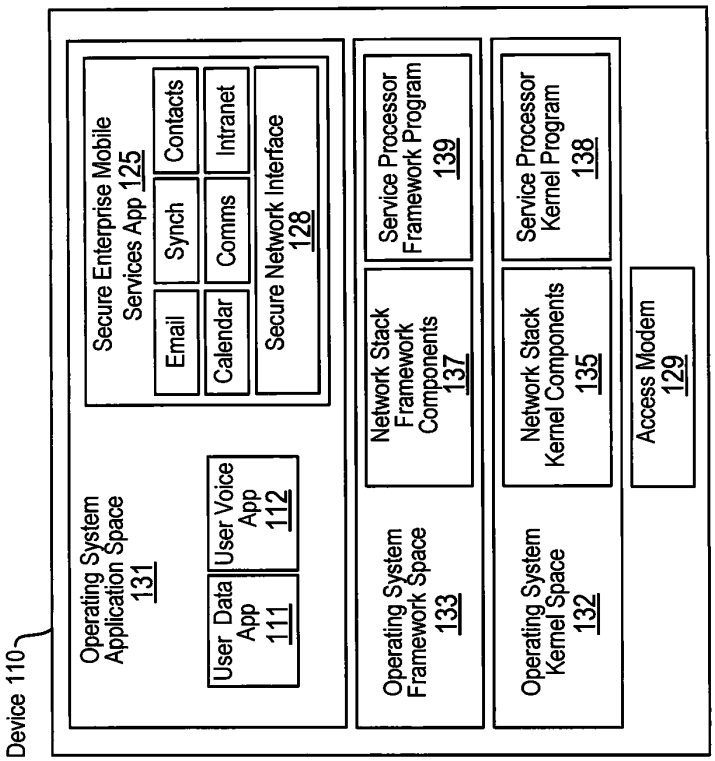

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User Data App 111
User Voice App 112
Secure Enterprise Mobile Services App 125
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Contacts
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Comms
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Secure Network Interface 128
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Service Processor Framework Program 139
Operating System Kernel Space 132
Network Stack Kernel Components 135
Service Processor Kernel Program 138
Access Modem 129

Fig. 16

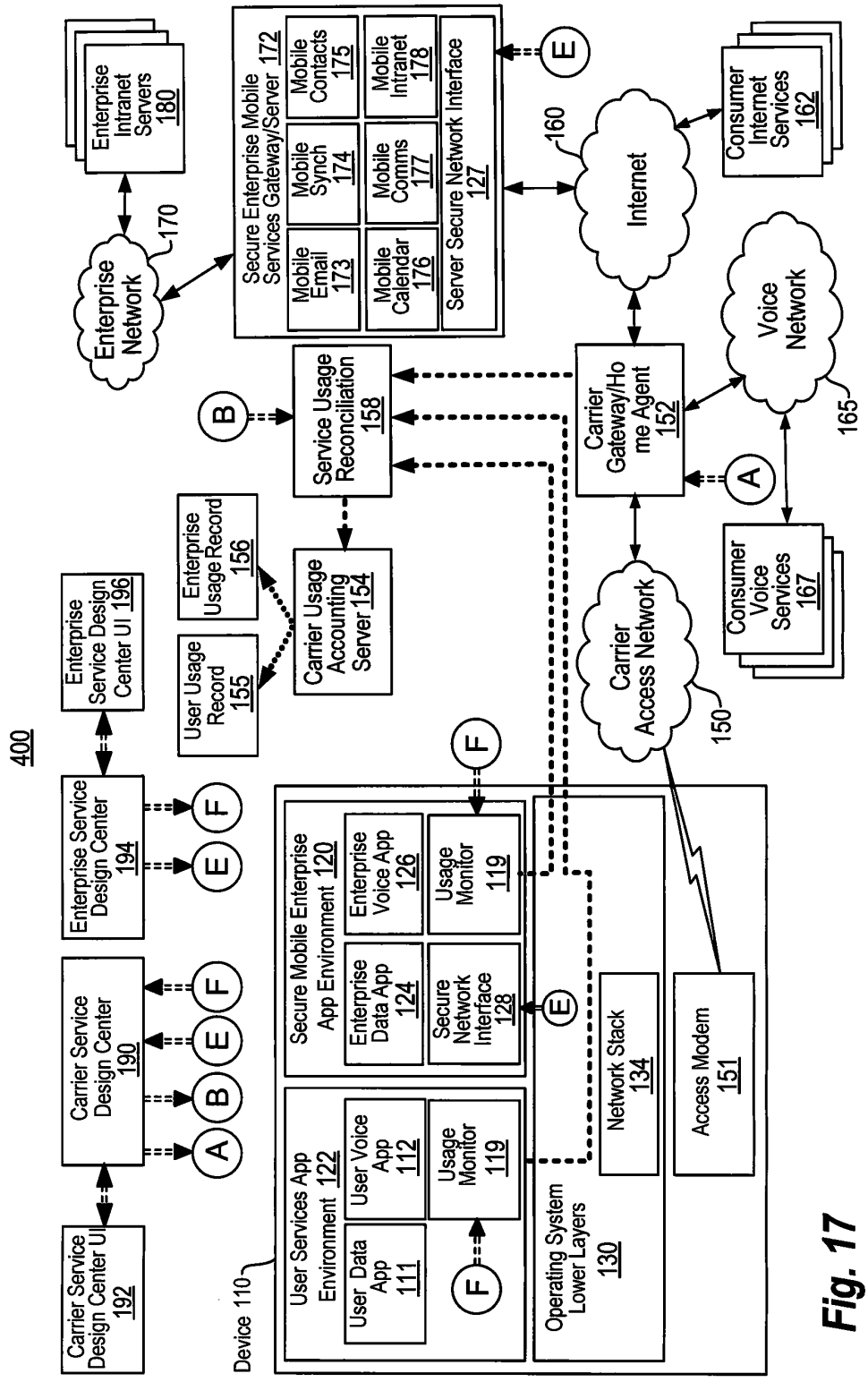

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Carrier Service Design Center UI 192
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Enterprise Voice App 126
Usage Monitor 119
Secure Network Interface 128
Operating System Lower Layers 130
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Fig. 17

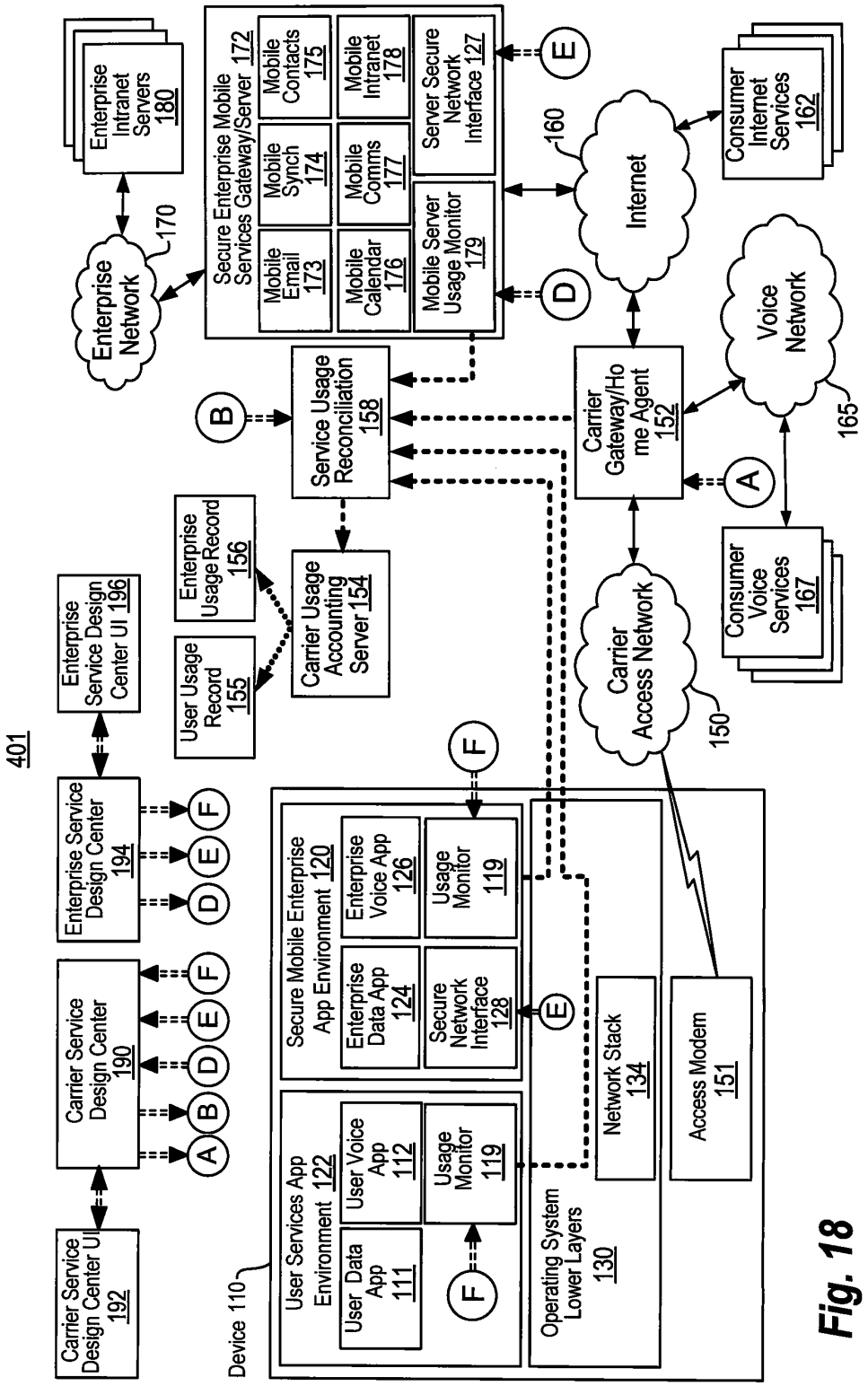

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Enterprise Network 170
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Mobile Synch 174
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Mobile Calendar 176
Mobile Comms 177
Mobile Intranet 178
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Consumer Internet Services 162
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User Usage Record 155
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Carrier Service Design Center UI 192
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Secure Mobile Enterprise App Environment 120
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Enterprise Voice App 126
Usage Monitor 119
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Operating System Lower Layers 130
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Fig. 18

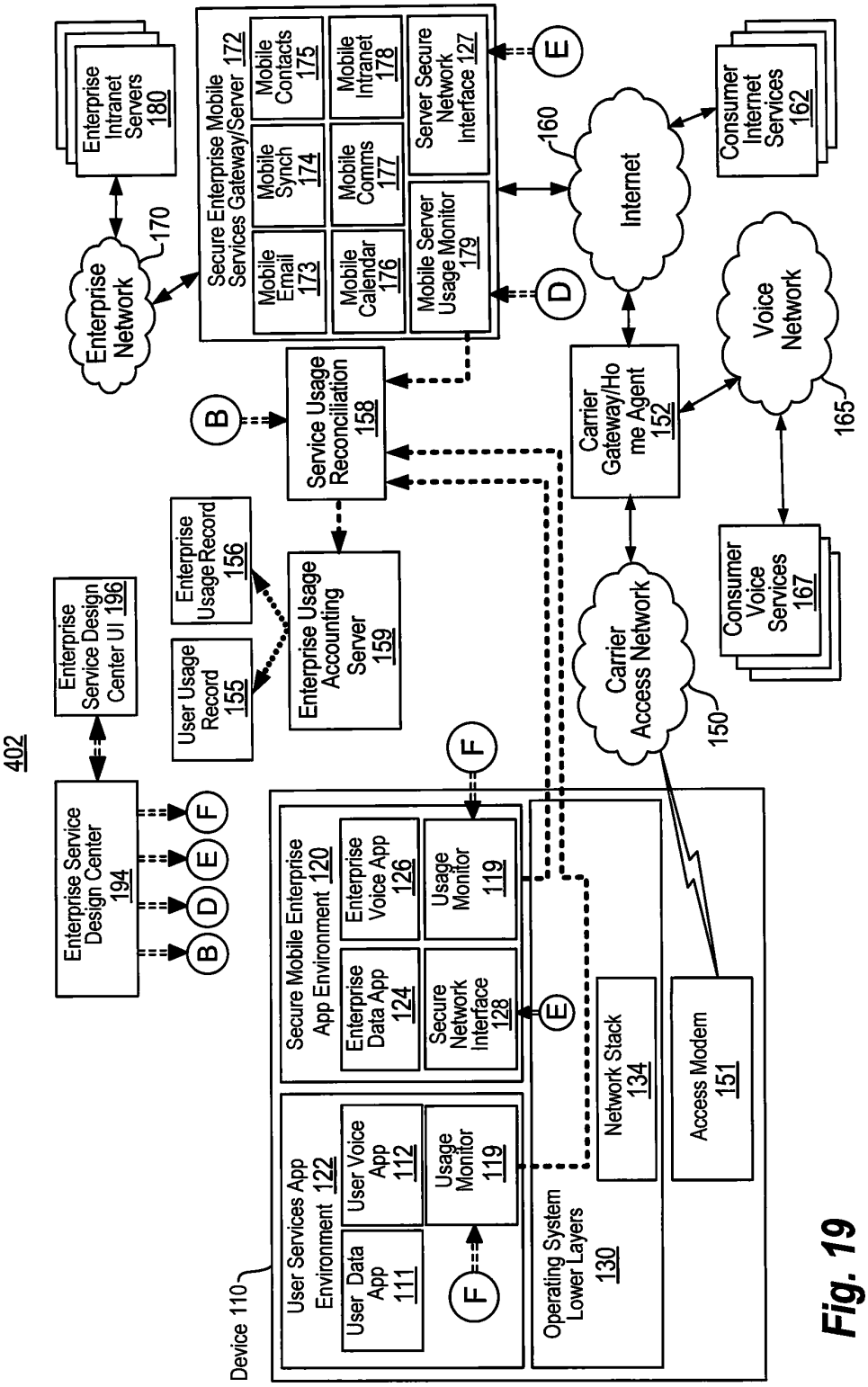

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Service Usage Reconciliation 158
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Secure Enterprise Mobile Services Gateway/Server 172
Mobile Email 173
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Mobile Contacts 175
Mobile Calendar 176
Mobile Comms 177
Mobile Intranet 178
Mobile Server Usage Monitor 179
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Enterprise Voice App 126
Secure Network Interface 128
Usage Monitor 119
Operating System Lower Layers 130
Network Stack 134
Access Modem 151
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Fig. 19

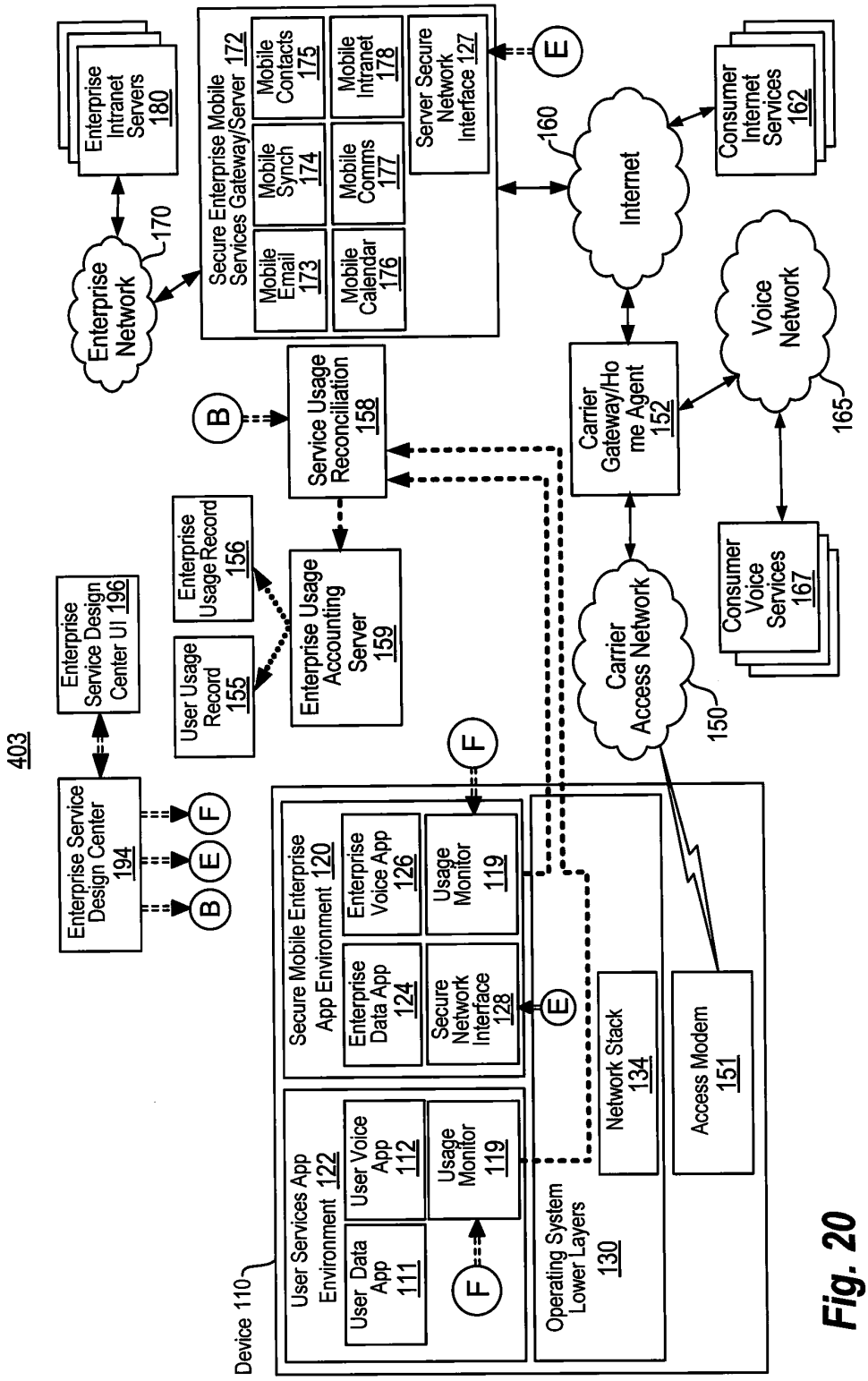

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User Voice App 112
Usage Monitor 119
Secure Mobile Enterprise App Environment 120
Enterprise Data App 124
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Enterprise Voice App 126
Usage Monitor 119
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Carrier Access Network
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Carrier Gateway/Home Agent 152
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Voice Network
165
Consumer Internet Services 162
Consumer Voice Services 167
Enterprise Network
170
Enterprise Intranet Servers 180
Secure Enterprise Mobile Services Gateway/Server 172
Mobile Email 173
Mobile Synch 174
Mobile Calendar 176
Mobile Comms 177
Mobile Contacts 175
Mobile Intranet 178
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Service Usage Reconciliation 158
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User Usage Record 155
Enterprise Usage Accounting Server 159
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B
E
F

Fig. 20

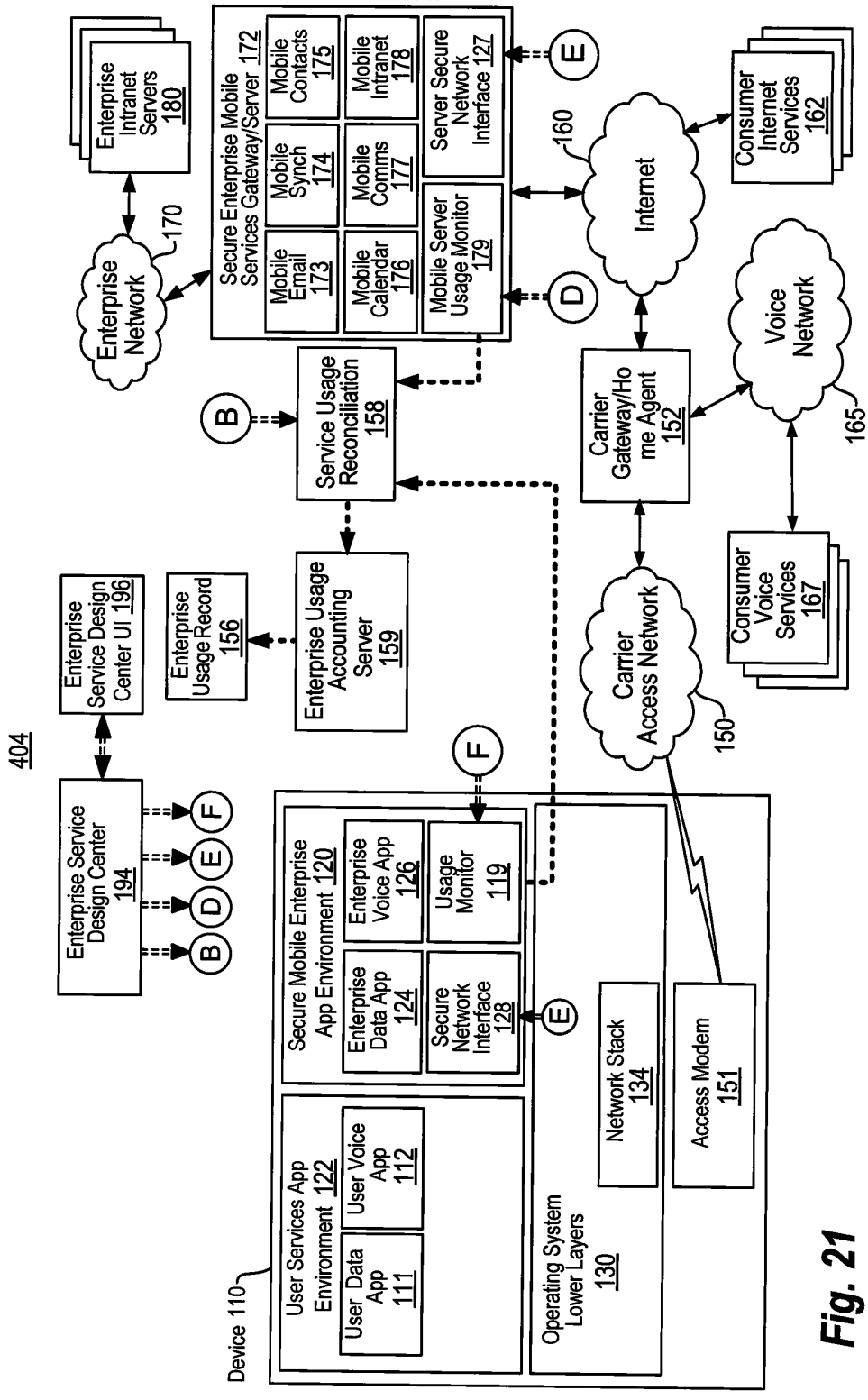

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Service Usage Reconciliation 158
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Enterprise Network
170
Secure Enterprise Mobile Services Gateway/Server 172
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Mobile Synch 174
Mobile Contacts 175
Mobile Calendar 176
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Mobile Server Usage Monitor 179
Server Secure Network Interface 127
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Carrier Access Network
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Fig. 21

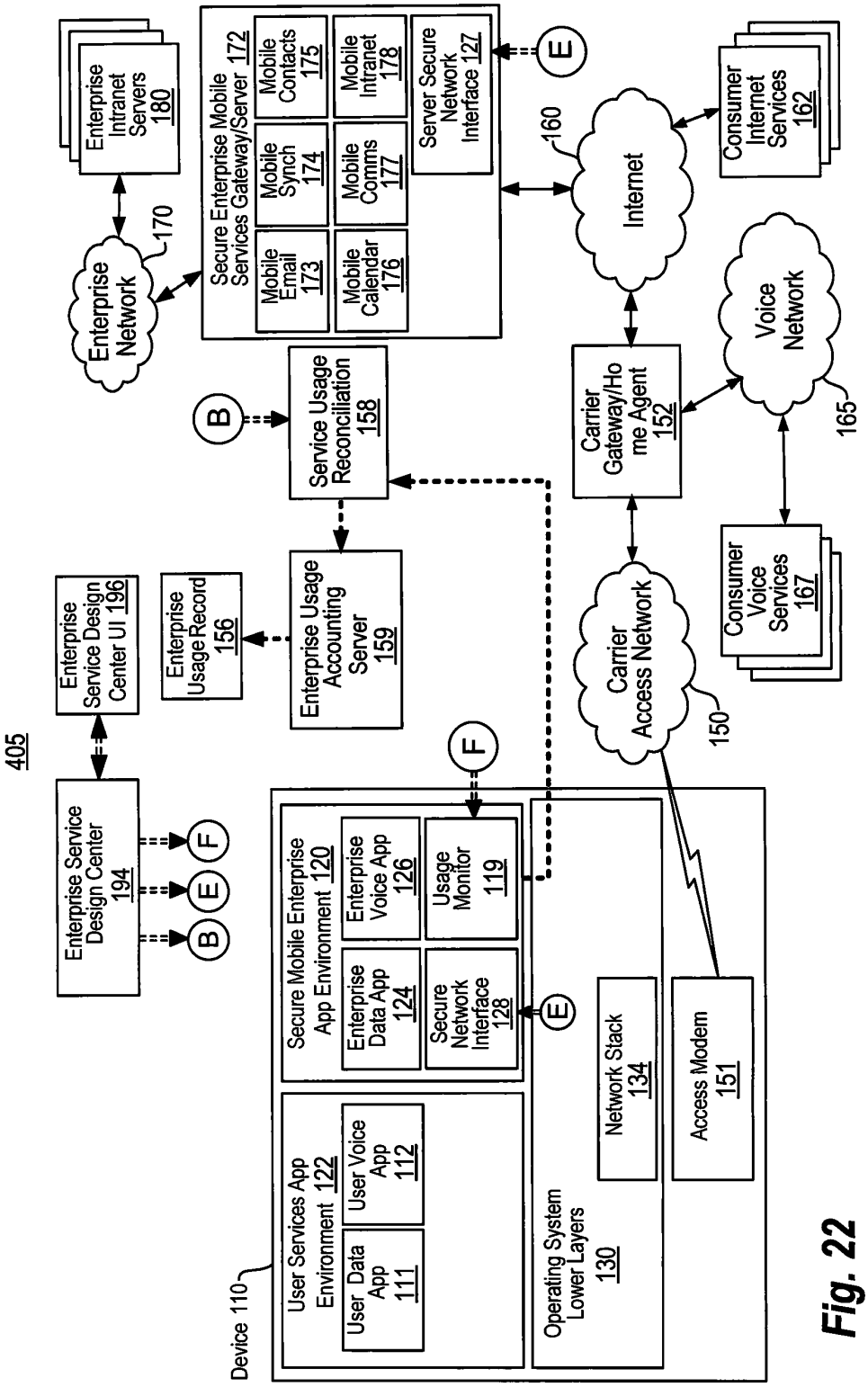

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Usage Monitor 119
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Network Stack 134
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F

Fig. 22

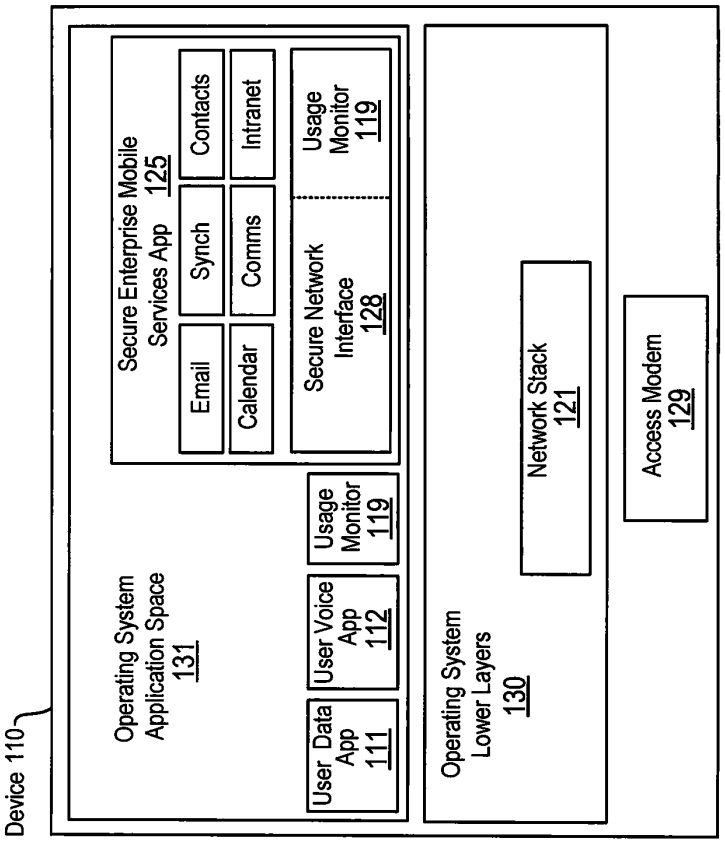

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Usage Monitor 119
Secure Enterprise Mobile Services App 125
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Calendar
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Comms
Contacts
Intranet
Secure Network Interface 128
Usage Monitor 119
Operating System Lower Layers 130
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Fig. 23

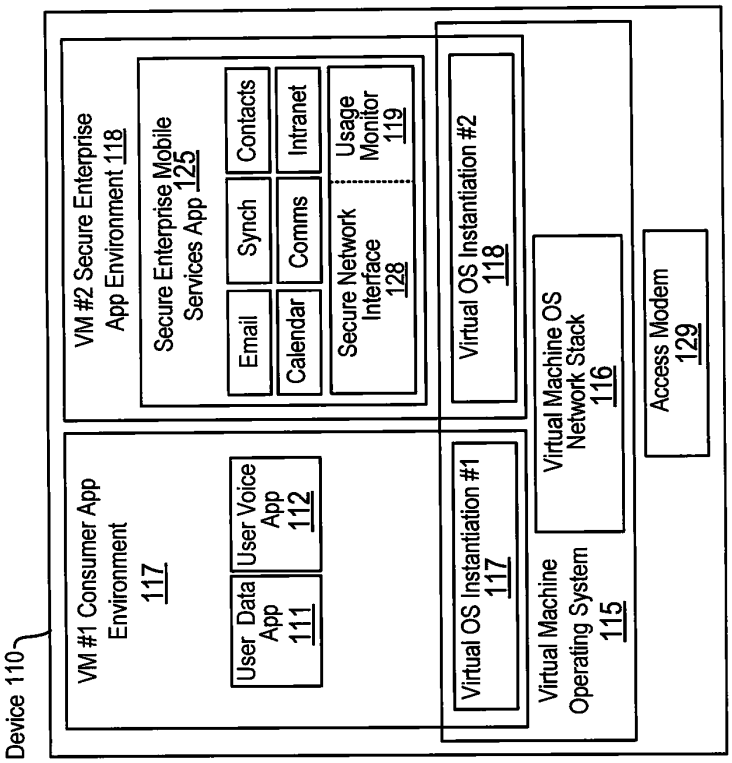

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User Data App 111
User Voice App 112
VM #2 Secure Enterprise App Environment 118
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Email
Calendar
Synch
Comms
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Intranet
Secure Network Interface 128
Usage Monitor 119
Virtual OS Instantiation #1 117
Virtual OS Instantiation #2 118
Virtual Machine Operating System 115
Virtual Machine OS Network Stack 116
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Fig. 24

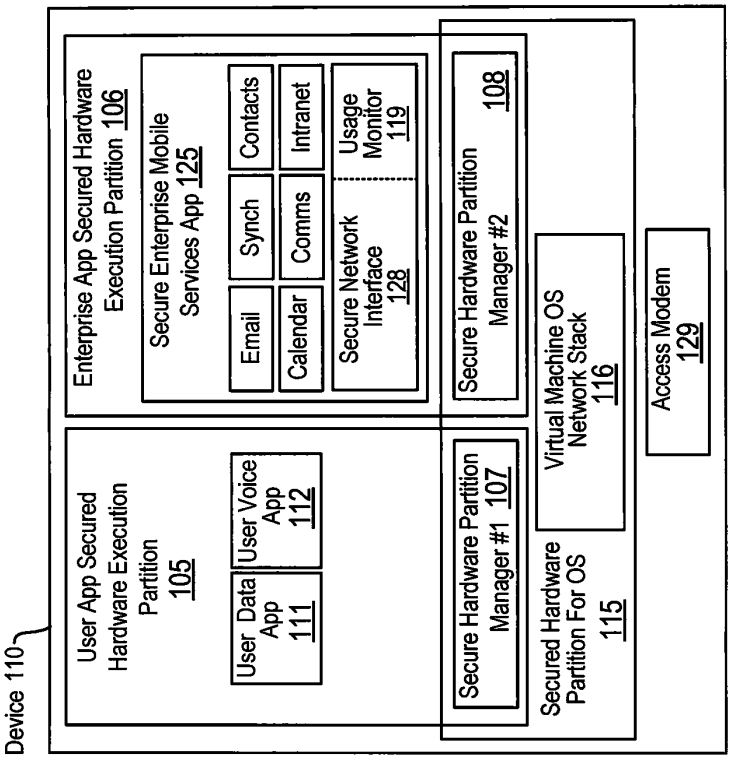

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Enterprise App Secured Hardware Execution Partition 106
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Secured Hardware Partition For OS 115
Secure Hardware Partition Manager #1 107
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Secure Hardware Partition Manager #2 108
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Fig. 25

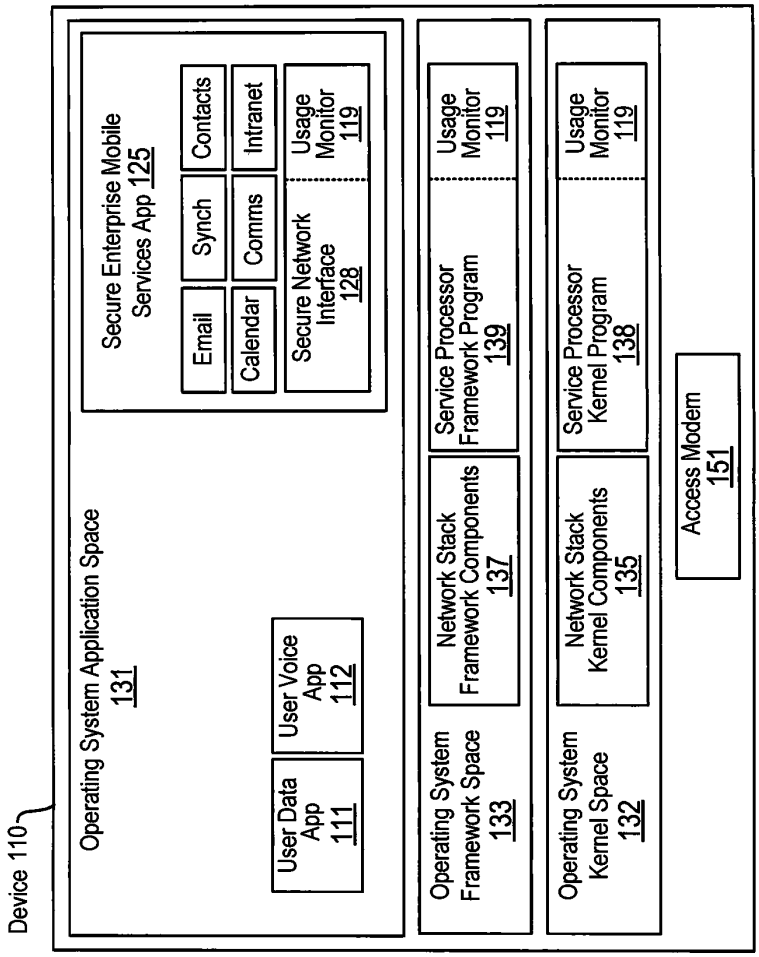

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Contacts
Calendar
Comms
Intranet
Secure Network Interface 128
Usage Monitor 119
User Data App 111
User Voice App 112
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Service Processor Framework Program 139
Usage Monitor 119
Operating System Kernel Space 132
Network Stack Kernel Components 135
Service Processor Kernel Program 138
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Fig. 26

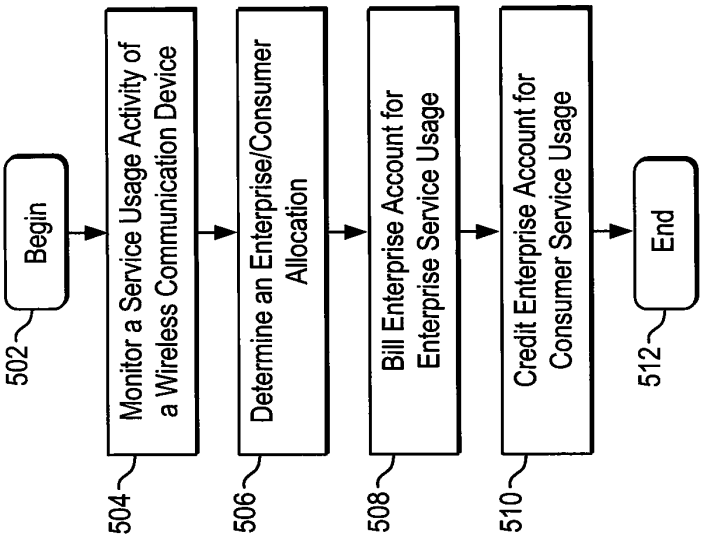

Begin
502
Monitor a Service Usage Activity of a Wireless Communication Device
504
Determine an Enterprise/Consumer Allocation
506
Bill Enterprise Account for Enterprise Service Usage
508
Credit Enterprise Account for Consumer Service Usage
510
End
512

Fig. 28

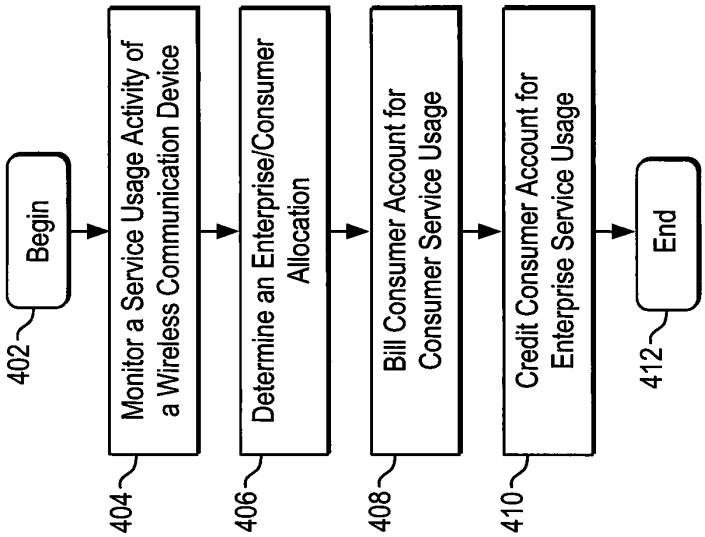

Begin
402
Monitor a Service Usage Activity of a Wireless Communication Device
404
Determine an Enterprise/Consumer Allocation
406
Bill Consumer Account for Consumer Service Usage
408
Credit Consumer Account for Enterprise Service Usage
410
End
412

Fig. 27

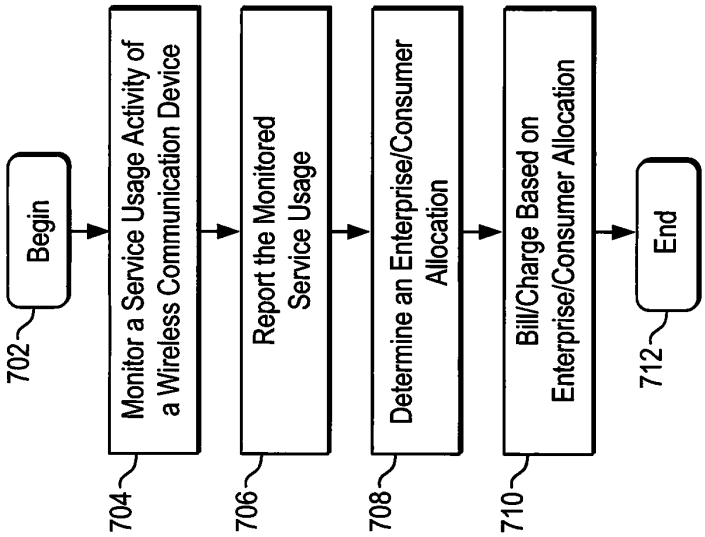

Begin
Monitor a Service Usage Activity of a Wireless Communication Device
Report the Monitored Service Usage
Determine an Enterprise/Consumer Allocation
Bill/Charge Based on Enterprise/Consumer Allocation
End
702
704
706
708
710
712

Fig. 30

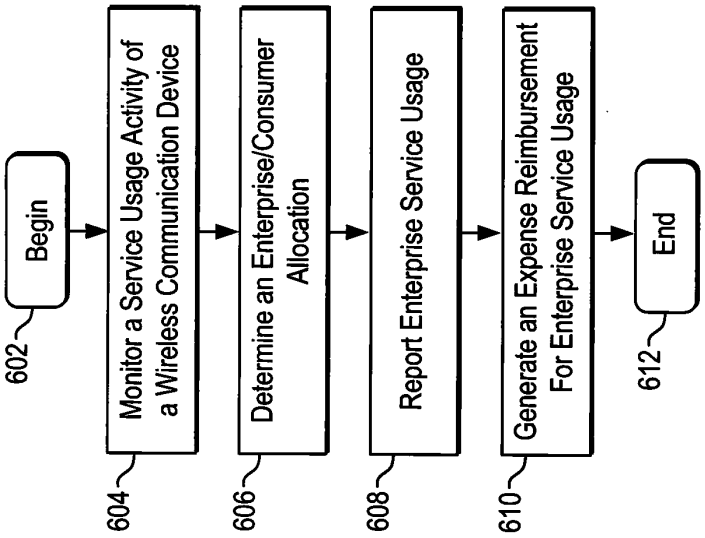

Begin
Monitor a Service Usage Activity of a Wireless Communication Device
Determine an Enterprise/Consumer Allocation
Report Enterprise Service Usage
Generate an Expense Reimbursement For Enterprise Service Usage
End
602
604
606
608
610
612

Fig. 29

Electronic Acknowledgement Receipt

EFS ID:	14360799
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	30-NOV-2012
Filing Date:	28-SEP-2011
Time Stamp:	20:50:48
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Transmittal Letter	P037Trans.pdf	653018 a53ac28cae476933b8d7939130a4d6e839108ce9	no	1
Warnings:					
Information:					

2	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	2665431 a7199916daacdd8206de093143fe547736f86b61	no	6
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Information:					
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3	Supplemental Response or Supplemental Amendment	P037Amend.pdf	617021 a2649f67c630ee0c3d6294489a84ff8a9e603ae58	no	2
Warnings:					
Information:					
4	Drawings-only black and white line drawings	P037Draw.pdf	5677310 84e0e8dd444b63f848ef8f70aa019e477f8eaf2b	no	28
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		Total Files Size (in bytes):	9612780		

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<u>New Applications Under 35 U.S.C. 111</u>
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

<u>National Stage of an International Application under 35 U.S.C. 371</u>
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

<u>New International Application Filed with the USPTO as a Receiving Office</u>
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: TRAN.LET

Document Description: Transmittal Letter

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TRANSMITTAL FORM

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Total Number of Pages in This Submission	37

Application Number	13/248028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh
Art Unit	3687 Conf. 8510
Examiner Name	Andrew J. Rudy
Attorney Docket Number	RALEP037

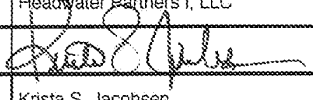
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- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
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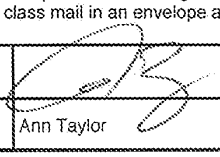
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SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Headwater Partners I, LLC		
Signature			
Printed name	Krista S. Jacobsen		
Date	November 30, 2012	Reg. No.	59374

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS

Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	7609700		2009-10-27	Ying, Wen-Ping et al.	
	2	8255515		2012-08-28	Melman, David et al.	
	3	7945240		2011-05-17	Klock, Jacqueline et al.	
	4	7912056		2011-03-22	Brassem, Wayne	
	5	7920529		2011-04-05	Mahler, Roger et al.	
	6	8184530		2012-05-22	Swan, Tim L. et al.	
	7	8213363		2012-07-03	Ying, Wen-Ping et al.	
	8	8214536		2012-07-03	Zhao, Wen	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
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	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	8255689		2012-08-28	Kim, Eun Ah et al.	
	10	7746854		2010-06-29	Ambe, Shekhar et al.	
	11	7068600		2006-06-27	Cain, Joseph Bibb	
	12	6876653		2005-04-05	Ambe, Shekhar et al.	
	13	6631122		2003-10-07	Arunachalam, Vaidhyanathan et al.	
	14	7599288		2009-10-06	Cole, Raymond E. et al.	
	15	7546629		2009-06-09	Albert, Anthony et al.	
	16	7747730		2010-06-29	Harlow, James D.	
	17	7609650		2009-10-27	Roskowski, Steve et al.	
	18	6581092		2003-06-17	Motoyama, Tetsuro et al.	
	19	7283963		2007-10-16	Fitzpatrick, John E. et al.	

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	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8271049		2012-09-18	Silver, Andrew et al.	
	21	7644151		2010-01-05	Jerrim, John et al.	

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	1	20080085707		2008-04-10	Fadell, Tony	
	2	20090046723		2009-02-19	Rahman, Reshad A. et al.	
	3	20080219268		2008-09-11	Dennison, Larry R.	
	4	20080005285		2008-01-03	Robinson, James David et al.	
	5	20090315735		2009-12-24	Bhavani, Neeraj S. et al.	
	6	20090219170		2009-09-03	Clark, Ryan C. et al.	
	7	20090067372		2009-03-12	Shah, Keyur C. et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	8	20080262798		2008-10-23	KIM, Eun Ah et al.	
	9	20100103820		2010-04-29	FULLER, Randy et al.	
	10	20100153781		2010-06-17	HANNA, Stephen R.	
	11	20120029718		2012-02-02	DAVIS, Edward L.	
	12	20110241624		2011-10-06	PARK, Jun-seok et al.	

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	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

EXAMINER SIGNATURE			
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[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

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Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☒ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

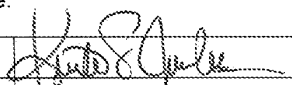
☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2012-11-30
Name/Print	Krista S. Jacobsen	Registration Number	59374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Raleigh et al.	Examiner:	RUDY, Andrew J.
Serial No.:	13/248,028	Art Unit:	3687
Filed:	September 28, 2011	Conf. No.:	8510
Title:	Enterprise Access Control and Accounting Allocation for Access Networks		

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

AMENDMENT AND RESPONSE TO RESTRICTION REQUIREMENT

Sir:

In response to the restriction requirement dated September 20, 2012, the deadline for response ending on October 22, 2102, Applicants respond as follows.

Amendments to the Claims begin on page 2.

Remarks begin on page 7.

AMENDMENTS TO THE CLAIMS

Prior to examination, please amend the claims as follows:

1. (Currently amended) A network system for providing network access service notification messages containing information about an attempted or successful network access activity of an end-user device communicatively coupled to the network system over a wireless access network, the network system comprising:

a first ~~service design center~~ set of one or more elements configured to:

obtain a first network access notification message policy comprising a first network access trigger condition and an associated first network access notification message, the first network access trigger condition ~~comprising~~ specifying a condition associated with one or more attempted ~~current~~ or successful ~~requested~~ end-user device network access activities, the first network access notification message comprising notification information to be presented ~~to a user~~ through a user interface,

determine, based on the first network access trigger condition, one or more network access trigger identification instructions,

communicate the one or more network access trigger identification instructions to a second set of one or more elements responsible for monitoring service usage associated with the end-user device,

receive a trigger condition indication from ~~a network~~ the second set of one or more elements, the trigger condition indication indicating that the first network access trigger condition has occurred, ~~and~~

~~associate the trigger condition indication with the first network access notification message,~~ and

assist in presenting the notification information ~~to the user~~ through the user interface,[[;]]

~~a network provisioning instruction translator configured to:~~

~~receive, from the first service design center, the first network access trigger condition, and~~

~~determine, based on the first network access trigger condition, one or more network access trigger identification instructions; and~~

~~a network provisioning system configured to communicate the one or more network access trigger identification instructions to one or more network elements responsible for monitoring the service usage,~~

wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring the service usage~~ is configured to:

execute the one or more network access trigger identification instructions to identify when the first network access trigger condition occurs, and

send the trigger condition indication to the first set of one or more elements ~~service design center~~.

2. (Currently amended) The network system recited in claim 1, wherein the first set of one or more elements comprises a first service design center, and further comprising a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set.

3. (Original) The network system of claim 2, wherein the master service design center is further configured to define a second notification policy design capability set for a second service design center, the second notification policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

4. (Currently amended) The network system recited in claim 1, wherein the first network access trigger condition comprises a period of time since a previous network access trigger condition, and the ~~first network access~~ notification ~~message~~ information comprises a real-time or near-real-time measure of an amount of service usage or a cost of service usage.

5. (Currently amended) The network system recited in claim 1, wherein the first network access trigger condition comprises an amount of service usage ~~or a cost of service usage~~, and the ~~first~~

~~network access~~ notification ~~message~~ information comprises a real-time or near-real-time measure of the amount of service usage or an aggregate service usage ~~or an aggregate cost~~.

6. (Currently amended) The network system recited in claim 1, wherein the user interface is an end-user device user interface, and wherein the first set of one or more elements ~~service design center~~ is ~~further~~ configured to assist in presenting the notification information through the user interface by sending [[a]] at least a portion of the user notification information ~~message~~ to ~~a user of~~ the end-user device ~~based on the first network access notification message~~.

7. (Currently amended) The network system recited in claim 1, wherein the first set of one or more elements includes a service design center [[is]] hosted on an operator network.

8. (Currently amended) The network system recited in claim 1, wherein the first set of one or more elements includes a service design center [[is]] hosted on an enterprise network.

9. (Original) The network system recited in claim 1, wherein the first network access trigger condition comprises a service usage limit or a specified amount of accrued cost.

10. (Original) The network system recited in claim 1, wherein the first network access trigger condition comprises a roaming service usage limit or specified amount of accrued roaming service cost.

11. (Currently amended) The network system recited in claim 1, wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring the service usage are~~ is configured to classify service usage by device application, and wherein the first network access trigger condition comprises one or more device application access activities.

12. (Currently amended) The network system recited in claim 1, wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring service usage are~~ is configured to classify service usage by network destination, and the first network access trigger condition comprises one or more device network destination access activities.

13. (Currently amended) The network system recited in claim 1, wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring service usage~~ comprises a service usage monitor located in a wireless operator network.

14. (Currently amended) The network system recited in claim 1, wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring service usage~~ comprises a service usage monitor located in an enterprise access network.

15. (Currently amended) The network system recited in claim 1, wherein the second set of one or more ~~network~~ elements ~~responsible for monitoring service usage~~ comprises a service usage monitor located on the end-user ~~a wireless~~ device.

16. (Currently amended) The network system recited in claim 1, wherein the first network access notification message policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials, and wherein the first set of one or more elements ~~service design center~~ is further configured to obtain a second network access notification message policy comprising a plurality of second network access trigger conditions and, for each of the plurality of second network access trigger conditions, an associated second network access notification message, the second network access notification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials.

17. (Original) The network system recited in claim 16, wherein the first network access notification message policy comprises a subset of the second network access notification message policy.

18-25. (Canceled)

26. (New) The network system recited in claim 1, wherein the first network access trigger condition comprises an amount of service usage.

27. (New) The network system recited in claim 1, wherein the first network access trigger condition comprises an amount of service usage on a roaming network.

28. (New) The network system recited in claim 1, wherein the first network access trigger condition is that the device is connected to or is attempting to connect to a roaming network.

29. (New) The network system recited in claim 1, wherein the first set of one or more elements includes one or more of: a service design center, a network provisioning translator, and a provisioning element.

30. (New) The network system recited in claim 1, wherein the first set of one or more elements is configured to assist in presenting the notification information through the user interface by presenting the notification information through a service design center user interface.

31. (New) The network system recited in claim 1, wherein the first network access trigger condition comprises a cost of service usage, and the notification information comprises a real-time or near-real-time measure of the cost of service usage or an aggregate service usage cost.

32. (New) The network system recited in claim 1, wherein the second set of one or more elements is further configured to block or to assist in blocking one or more communications associated with the end-user device after the first network access trigger condition has occurred.

33. (New) The network system recited in claim 1, wherein the second set of one or more elements is further configured to restrict or to assist in restricting one or more communications associated with the end-user device after the first network access trigger condition has occurred.

REMARKS

The Office Action dated September 20, 2012, imposed a restriction requirement on claims 1-24, asserting that claims 1-17 (Group I) are directed to a first invention, claims 18-22 (Group II) are directed to a second invention, claim 23 (Group III) is directed to a third invention, and claim 24 (Group IV) is directed to a fourth invention.

Applicants respectfully note that claim 25 is not listed in the Office Action. Applicants believe that claim 25 belongs in Group IV because claim 25 depends from claim 24.

Applicants elect the claims of Group I, namely, claims 1-17, without traverse, for further prosecution. Claims 18-25 are being canceled.

Applicants are amending claims 1, 2, 4-8, and 11-16. Applicants are adding claims 26-33, all of which depend from claim 1. No new matter is being added.

The amendments to claim 1 are supported at least by ¶¶ [0094], [0119], and [0144]. Claim 26 is supported at least by ¶ [0082]. Claim 27 is supported at least by ¶ [0141]. Claim 28 is supported at least by ¶ [0082]. Claim 29 is supported at least by ¶ [0165]. Claim 30 is supported at least by ¶ [0141]. Claim 31 is supported at least by ¶ [0149] and as-filed claims 4 and 5. Claim 32 is supported at least by ¶¶ [0119] and [0142]. Claim 33 is supported at least by ¶¶ [0142] and [0153].

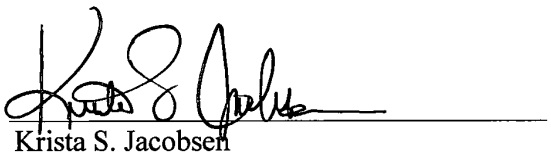
CONCLUSION

Applicants elect the claims of Group I, namely, claims 1-17. Applicants are canceling claims 18-25. Applicants are amending claims 1, 2, 4-8, and 11-16 and adding claims 26-33. No new matter is being added.

Applicants respectfully request entry of the amendments herein before examination of the Application.

If the Examiner has any questions or needs any additional information, the Examiner is invited to contact the undersigned. The Commissioner is authorized to charge any fee deficiency or credit any overpayment to Deposit Account 50-5876.

Respectfully submitted,

Date: October 22, 2012 By: 

Krista S. Jacobsen
Reg. No. 59,374
Head Counsel
Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065
(650) 517-2798

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Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	22-OCT-2012
Filing Date:	28-SEP-2011
Time Stamp:	17:12:01
Application Type:	Utility under 35 USC 111(a)

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	Response to Election / Restriction Filed	1	1
	Claims	2	6
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New International Application Filed with the USPTO as a Receiving Office
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Total Number of Pages in This Submission: 9

Application Number	13/248028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh
Art Unit	3687 Conf. 8510
Examiner Name	Andrew J. Rudy
Attorney Docket Number	RALEP037

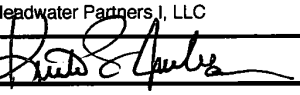
ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☑ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☐ Information Disclosure Statement
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
  - ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Attorney, Revocation Change of Correspondence Address
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
  - ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☐ Other Enclosure(s) (please Identify below):

Remarks

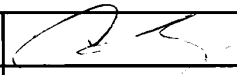
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SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Headwater Partners I, LLC		
Signature			
Printed name	Krista S. Jacobsen		
Date	October 22, 2012	Reg. No.	59374

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Typed or printed name	Ann Taylor	Date	October 22, 2012

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PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number	Filing Date	☐ To be Mailed
13/248,028	09/28/2011	

APPLICATION AS FILED – PART I

	(Column 1)	(Column 2)	SMALL ENTITY ☒		OR	OTHER THAN SMALL ENTITY	
FOR	NUMBER FILED	NUMBER EXTRA	RATE ($)	FEE ($)		RATE ($)	FEE ($)
☐ BASIC FEE (37 CFR 1.16(a), (b), or (c))	N/A	N/A	N/A			N/A	
☐ SEARCH FEE (37 CFR 1.16(k), (i), or (m))	N/A	N/A	N/A			N/A	
☐ EXAMINATION FEE (37 CFR 1.16(o), (p), or (q))	N/A	N/A	N/A			N/A	
TOTAL CLAIMS (37 CFR 1.16(i))	minus 20 =	*	X $ =		OR	X $ =	
INDEPENDENT CLAIMS (37 CFR 1.16(h))	minus 3 =	*	X $ =			X $ =	
☐ APPLICATION SIZE FEE (37 CFR 1.16(s))	If the specification and drawings exceed 100 sheets of paper, the application size fee due is $250 ($125 for small entity) for each additional 50 sheets or fraction thereof. See 35 U.S.C. 41(a)(1)(G) and 37 CFR 1.16(s).						
☐ MULTIPLE DEPENDENT CLAIM PRESENT (37 CFR 1.16(j))							
* If the difference in column 1 is less than zero, enter "0" in column 2.			TOTAL			TOTAL	

APPLICATION AS AMENDED – PART II

		(Column 1)		(Column 2)	(Column 3)	SMALL ENTITY		OR	OTHER THAN SMALL ENTITY	
AMENDMENT	10/22/2012	CLAIMS REMAINING AFTER AMENDMENT		HIGHEST NUMBER PREVIOUSLY PAID FOR	PRESENT EXTRA	RATE ($)	ADDITIONAL FEE ($)		RATE ($)	ADDITIONAL FEE ($)
	Total (37 CFR 1.16(i))	* 25	Minus	** 25	= 0	X $31 =	0	OR	X $ =	
	Independent (37 CFR 1.16(h))	* 1	Minus	***4	= 0	X $125 =	0	OR	X $ =	
	☐ Application Size Fee (37 CFR 1.16(s))									
	☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE	0	OR	TOTAL ADD'L FEE	

		(Column 1)		(Column 2)	(Column 3)					
AMENDMENT		CLAIMS REMAINING AFTER AMENDMENT		HIGHEST NUMBER PREVIOUSLY PAID FOR	PRESENT EXTRA	RATE ($)	ADDITIONAL FEE ($)		RATE ($)	ADDITIONAL FEE ($)
	Total (37 CFR 1.16(i))	*	Minus	**	=	X $ =		OR	X $ =	
	Independent (37 CFR 1.16(h))	*	Minus	***	=	X $ =		OR	X $ =	
	☐ Application Size Fee (37 CFR 1.16(s))									
	☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE	

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.

** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".

*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".

The "Highest Number Previously Paid For" (Total or Independent) is the highest number found in the appropriate box in column 1.

Legal Instrument Examiner:
/BRENDA TURNER/

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (**Not for submission under 37 CFR 1.99**)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6502131		2002-12-31	Vaid, Aseem et al.	
	2	6505114		2003-01-07	Luciani, Sergio	
	3	6763000		2004-07-13	Walsh, Peter J.	
	4	6967958		2005-11-22	Ono, Yoshiyuki et al.	
	5	7644267		2010-01-05	Ylikoski, Martti et al.	
	6	7710932		2010-05-04	Muthuswamy, Sivakumar et al.	
	7	7881199		2011-02-01	Krstulich, Zlatko	
	8	7886047		2011-02-08	Potluri, Dora	

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7911975		2011-03-22	Droz, Patrick et al.	
	10	8050275		2011-11-01	Iyer, Jayaraman R.	
	11	8194553		2012-06-05	Liang, Zhi Yong et al.	
	12	8239520		2012-08-07	Grah, Adrian et al.	
	13	7890084		2011-02-15	Dudziak, Thaddeus Jude et al.	
	14	7890111		2011-02-15	Bugenhagen, Michael K.|	
	15	6226277		2001-05-01	Chuah, Mooi Choo	
	16	6839340		2005-01-04	Voit, Eric A. et al.	
	17	6922562		2005-07-26	Ward, Stephen L. et al.	
	18	7620041		2009-11-17	Dunn, Jeffrey H. et al.	
	19	7627314		2009-12-01	Carlson, Steven I. et al.	

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	Art Unit	3687
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	20	7792538		2010-09-07	Kozisek, Steven E.	
	21	7801523		2010-09-21	Kenderov, Stoyan	
	22	7877090		2011-01-25	Maes, Stephane H.	
	23	7912025		2011-03-22	Pattenden, Christopher E. S. et al.	
	24	7948968		2011-05-24	Voit, Eric A. et al.	
	25	7970426		2011-06-28	Poe, Brian R. et al.	
	26	8185158		2012-05-22	Tamura, Motoshi et al.	
	27	8254915		2012-08-28	Kozisek, Steven E.	
	28	7418257		2008-08-26	Kim, Myong-Ju	
	29	8126123		2012-02-28	Cai, Yigang et al.	
	30	7903553		2011-03-08	Liu, Enhui	

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	First Named Inventor	Raleigh, Gregory G.
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	Attorney Docket Number	RALEP037

	31	8155620		2012-04-10	Wang, Jun et al.	
	32	8238287		2012-08-07	Gopi, Paramesh et al.	
	33	7113997		2006-09-26	Jayapalan, Jay et al.	
	34	5594777		1997-01-14	Makkonen, Matti et al.	
	35	8244241		2012-08-14	Montemurro, Michael	
	36	7756534		2010-07-13	Anupam, Vinod et al.	
	37	7636574		2009-12-22	Poosala, Viswanath	
	38	6678516		2004-01-13	Nordman, Ian et al.	
	39	6477670		2002-11-05	Ahmadvand, Nima	
	40	6038452		2000-03-14	Strawczynski, Leo et al.	
	41	8160015		2012-04-17	Rashid, Mohammed H. et al.	

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	Art Unit	3687
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	Attorney Docket Number	RALEP037

	42	8108520		2012-01-31	Ruutu, Jussi et al.	
	43	7778643		2010-08-17	Laroia, Rajiv et al.	
	44	7668176		2010-02-23	Chuah, Mooi Choo	
	45	7515608		2009-04-07	Yuan, Yuan et al.	
	46	7251218		2007-07-31	Jorgensen, Jacob W.	
	47	7002920		2006-02-21	Ayyagari, Deepak et al.	
	48	7685131		2010-03-23	Batra, Vishal Singh et al.	
	49	7283561		2007-10-16	Picher-Dempsey, Heidi	
	50	7212491		2007-05-01	Koga, Takahiro	
	51	6683853		2004-01-27	Kannas, Chris et al.	
	52	8135392		2012-03-13	Marcellino, Chris et al.	

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	53	7953808		2011-05-31	Sharp, Christopher Brooke et al.	
	54	8064896		2011-11-22	Bell, Kris M. et al.	
	55	8275830		2012-09-25	Raleigh, Gregory G.	

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U.S.PATENT APPLICATION PUBLICATIONS

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20100144310		2010-06-10	Bedingfield Sr., James Carlton, et al.	
	2	20080132201		2008-06-05	Karlberg, Johan	
	3	20080081606		2008-04-03	Cole, Terry L.	
	4	20090248883		2009-10-01	Suryanarayana, Lalitha et al.	

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FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2] i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]

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	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

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Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

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OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

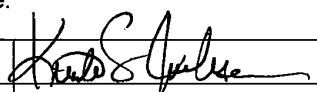
☐ See attached certification statement.

☒ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☐ None

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A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2012-10-09
Name/Print	Krista S. Jacobsen	Registration Number	59374

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Electronic Patent Application Fee Transmittal	
Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Krista Susan Jacobsen/Ann Taylor
Attorney Docket Number:	RALEP037 [26WV-160514]
Filed as Large Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
Submission- Information Disclosure Stmt	1806	1	180	180
		Total in USD ($)		**180**

Electronic Acknowledgement Receipt	
EFS ID:	13946794
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	10-OCT-2012
Filing Date:	28-SEP-2011
Time Stamp:	01:51:57
Application Type:	Utility under 35 USC 111(a)

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Payment Type	Deposit Account
Payment was successfully received in RAM	$180
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Deposit Account	505876
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File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Transmittal Letter	P037TRANS.pdf	318830 b240e8e5dfce66f276b4cafb8a2a287a3e99f69d	no	1
Warnings:					
Information:					
2	Information Disclosure Statement (IDS) Form (SB08)	P037IDS.pdf	1628747 e9c188e63edf0088b8b52b9a39e8e2aed464d613	no	8
Warnings:					
Information:					
This is not an USPTO supplied IDS fillable form					
3	Fee Worksheet (SB06)	fee-info.pdf	30482 d73d17b9d9863de721a1d12c43185f4edc179da0	no	2
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If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

<u>National Stage of an International Application under 35 U.S.C. 371</u>
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

<u>New International Application Filed with the USPTO as a Receiving Office</u>
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: TRAN.LET

Document Description: Transmittal Letter

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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission	10

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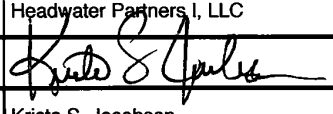
ENCLOSURES *(Check all that apply)*

- [x] Fee Transmittal Form
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- [ ] Petition to Convert to a Provisional Application
- [ ] Power of Attorney, Revocation Change of Correspondence Address
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- [ ] Request for Refund
- [ ] CD, Number of CD(s) _____
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- [ ] After Allowance Communication to TC
- [ ] Appeal Communication to Board of Appeals and Interferences
- [ ] Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- [ ] Proprietary Information
- [ ] Status Letter
- [ ] Other Enclosure(s) (please Identify below):

Remarks

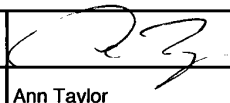
You are hereby authorized to charge any additional fee required or credit any overpayment to Deposit Account No. 50-5876.

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Headwater Partners I, LLC		
Signature			
Printed name	Krista S. Jacobsen		
Date	October 9, 2012	Reg. No.	59374

CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being facsimile transmitted to the USPTO or deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below:

Signature			
Typed or printed name	Ann Taylor	Date	October 9, 2012

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/248,028	09/28/2011	Gregory G. Raleigh	RALEP037 [26WV-160514]	8510

107265 7590 09/20/2012

Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

EXAMINER	
RUDY, ANDREW J	

ART UNIT	PAPER NUMBER
3687	

NOTIFICATION DATE	DELIVERY MODE
09/20/2012	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patent@headwaterllc.com

Office Action Summary	Application No.	Applicant(s)	
	13/248,028	RALEIGH ET AL.	
	Examiner	Art Unit	
	ANDREW JOSEPH RUDY	3687	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____.

2a)☐ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.

4)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

5)☒ Claim(s) 1-24 is/are pending in the application.

5a) Of the above claim(s) _____ is/are withdrawn from consideration.

6)☐ Claim(s) _____ is/are allowed.

7)☐ Claim(s) _____ is/are rejected.

8)☐ Claim(s) _____ is/are objected to.

9)☒ Claim(s) 1-24 are subject to restriction and/or election requirement.

Application Papers

10)☐ The specification is objected to by the Examiner.

11)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

12)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:

   I. Claims 1-17, drawn to a network system, classified in class 709, subclass 203.

   II. Claims 18-22, drawn to a network system, classified in class 709, subclass 224.

   III. Claim 23, drawn to a communication device, classified in class 455, subclass 414.1.

   IV. Claim 24, drawn to a network system, classified in class 709, subclass 217.

2. The inventions are distinct, each from the other because of the following reasons:

Inventions Group I and Groups II, III, IV are directed to related products. The related inventions are distinct if: (1) the inventions as claimed are either not capable of use together or can have a materially different design, mode of operation, function, or effect; (2) the inventions do not overlap in scope, i.e., are mutually exclusive; and (3) the inventions as claimed are not obvious variants. See MPEP § 806.05(j). In the instant case, the inventions as claimed have different mode of operation, function and effect. Furthermore, the inventions as claimed do not encompass overlapping subject matter and there is nothing of record to show them to be obvious variants.

3. The inventions are distinct, each from the other because of the following reasons:

Inventions Group II and Groups III, IV are directed to related products. The related inventions are distinct if: (1) the inventions as claimed are either not capable of use together or can have a materially different design, mode of operation, function, or effect; (2) the inventions do not overlap in scope, i.e., are mutually exclusive; and (3) the inventions as claimed are not obvious variants. See MPEP § 806.05(j). In the instant case, the inventions as claimed have different mode of operation, function and effect. Furthermore, the inventions as claimed do not encompass overlapping subject matter and there is nothing of record to show them to be obvious variants.

4. The inventions are distinct, each from the other because of the following reasons:

Inventions Group IIII and Group IV are directed to related products. The related inventions are distinct if: (1) the inventions as claimed are either not capable of use together or can have a materially different design, mode of operation, function, or effect; (2) the inventions do not overlap in scope, i.e., are mutually exclusive; and (3) the inventions as claimed are not obvious variants. See MPEP § 806.05(j). In the instant case, the inventions as claimed have different mode of operation, function and effect. Furthermore, the inventions as claimed do not encompass overlapping subject matter and there is nothing of record to show them to be obvious variants.

5. Restriction for examination purposes as indicated is proper because all these inventions listed in this action are independent or distinct for the reasons given above and there would be a serious search and/or examination burden if restriction were not required because at least the following reason(s) apply:

The scope of each claim set is divergent.

Applicant is advised that the reply to this requirement to be complete must include (i) an election of a invention to be examined even though the requirement may be traversed (37 CFR 1.143) **and (ii) identification of the claims encompassing the elected invention**.

The election of an invention may be made with or without traverse. To reserve a right to petition, the election must be made with traverse. If the reply does not distinctly and specifically point out supposed errors in the restriction requirement, the election shall be treated as an election without traverse. Traversal must be presented at the time of election in order to be considered timely. Failure to timely traverse the requirement will result in the loss of right to petition under 37 CFR 1.144. If claims are added after the election, applicant must indicate which of these claims are readable upon the elected invention.

Should applicant traverse on the ground that the inventions are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the inventions to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable

over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

6. A telephone call was made to Krista Jacobsen (Reg. No. 59,,374) on September 13, 2012 to request an oral election to the above restriction requirement, but did not result in an election being made.

7. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to ANDREW JOSEPH RUDY whose telephone number is (571)272-6789. The examiner can normally be reached on Monday thru Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew S. Gart can be reached on 571-272-3955. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ANDREW JOSEPH RUDY/
Primary Examiner, Art Unit 3687

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Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

MAILED

SEP 07 2012

OFFICE OF PETITIONS

In re Application of :
Gregory G. Raleigh et al. :
Application No. 13/248,028 :
Filed: December 28, 2011 :
Attorney Docket No. **RALEP037 [26WV-160514]** :

DECISION ON PETITION TO WITHDRAW FROM RECORD

This is a decision on the request to withdraw as attorney of record under 37 CFR § 1.36(b), filed July 10, 2012.

The request is **NOT APPROVED** as moot.

A review of the file record indicates that the power of attorney to attorneys/agents associated with Customer Number 69849 has been revoked by the assignee who has intervened of the patent application on July 5, 2012. Accordingly, the request to withdraw under 37 CFR § 1.36(b) is moot.

All future communications from the Office will continue to be directed to the address of record until otherwise notified by applicant.

Telephone inquiries concerning this decision should be directed to the undersigned at 571-272-4584.

/JoAnne Burke/
JoAnne Burke
Petitions Examiner
Office of Petitions

PTO/SB/08a (01-10)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G. et al.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

U.S.PATENTS						
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	6418147		2002-07-09	Wiedeman, Robert A	
	2	6574465		2003-06-03	Marsh, William et al.	
	3	6765864		2004-07-20	Natarajan, Shankar et al.	
	4	7366497		2008-04-29	Nagata, Hideaki	
	5	7388950		2008-06-17	Elsey, Nicholas J. et al.	
	6	7450927		2008-11-11	Creswell, Carroll W. et al.	
	7	7499537		2009-03-03	Elsey, Nicholas J. et al.	
	8	7610328		2009-10-27	Haase, Oliver et al.	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G. et al.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	9	7650137		2010-01-19	Jobs, Steven P. et al.	
	10	7693720		2010-04-06	Kennewick, Robert A. et al.	
	11	7734784		2010-06-08	Araujo, Wladimir et al.	
	12	7747699		2010-06-29	Prueitt, James K. et al.	
	13	7792708		2010-09-07	Alva, Jessi	
	14	7797401		2010-09-14	Stewart, Hugh Donal et al.	
	15	7822837		2010-10-26	Urban, Mark et al.	
	16	7949529		2011-05-24	Weider, Chris et al.	
	17	8095666		2012-01-10	Schmidt, Jonathan E. et al.	
	18	8099077		2012-01-17	Chowdhury, Amor et al.	
	19	8099517		2012-01-17	Jia, Lujun R. et al.	

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	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	20	8170553		2012-05-01	Bennett, James D.	
	21	7984130		2011-07-19	Bogineni, Kalyani et al.	
	22	8019687		2011-09-13	Wang, Feng Chi et al.	
	23	8144591		2012-03-27	Ghai, Rajat et al.	
	24	7336960		2008-02-26	Zavalkovsky, Arthur et al.	
	25	8194549		2012-06-05	Huber, Kurt Donald et al.	
	26	6606744		2003-08-12	Mikurak, Michael G.	
	27	8190675		2012-05-29	Tribbett, David	
	28	8200775		2012-06-12	Moore, James F.	
	29	7069248		2006-06-27	Huber, Adriano	

If you wish to add additional U.S. Patent citation information please click the Add button.

U.S.PATENT APPLICATION PUBLICATIONS

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G. et al.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20030018524		2003-01-23	Fishman, Dan et al.	
	2	20030046396		2003-03-06	Richter, Roger K.	
	3	20030220984		2003-11-27	Jones, Paul David et al.	
	4	20040021697		2004-02-05	Beaton, Brian Finlay et al.	
	5	20040107360		2004-06-03	Herrmann, Conrad K. et al.	
	6	20070061243		2007-03-15	Ramer, Jorey et al.	
	7	20070282896		2007-12-06	Wydroug, Zoe M. et al.	
	8	20080184127		2008-07-31	Rafey, Richter A. et al.	
	9	20090013157		2009-01-08	Beaule, Stephane	
	10	20090079699		2009-03-26	SUN, JIAN	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G. et al.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	11	20110126141		2011-05-26	King, Bennett M. et al.	
	12	20100227632		2010-09-09	Bell, Kris M. et al.	
	13	20100103820		2010-04-29	Fuller, Randy et al.	
	14	20070254675		2007-11-01	Zorlu Ozer, Sebnem et al.	
	15	20080005285		2008-01-03	Robinson, James David et al.	
	16	20090113514		2009-04-30	Hu, Q. James	

If you wish to add additional U.S. Published Application citation information please click the Add button.

FOREIGN PATENT DOCUMENTS

Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]i	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
	1							☐

If you wish to add additional Foreign Patent Document citation information please click the Add button

NON-PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Raleigh, Gregory G. et al.
	Art Unit	3687
	Examiner Name	Rudy, Andrew J.
	Attorney Docket Number	RALEP037

	1		☐

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Raleigh, Gregory G. et al.
Art Unit	3687
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

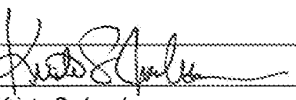
☐ See attached certification statement.

☐ Fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ None

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature		Date (YYYY-MM-DD)	2012-08-14
Name/Print	Krista S. Jacobsen	Registration Number	59,374

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these record s.

2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.

3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.

4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).

5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt

EFS ID:	13497278
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	107265
Filer:	Krista Susan Jacobsen/Ann Taylor
Filer Authorized By:	Krista Susan Jacobsen
Attorney Docket Number:	RALEP037 [26WV-160514]
Receipt Date:	14-AUG-2012
Filing Date:	28-SEP-2011
Time Stamp:	18:57:15
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Transmittal Letter	Trans.pdf	365540 bf684590d7eda8d4ffe359ca8cccd6c7a82d0a33	no	1
Warnings:					
Information:					

2	Information Disclosure Statement (IDS) Form (SB08)	IDS.pdf	1280049 a442e378b9955ea7cd8bbf8545e0f56a14ce399a	no	8

Warnings:	
Information:	
This is not an USPTO supplied IDS fillable form	
Total Files Size (in bytes):	1645589

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: TRAN.LET

Document Description: Transmittal Letter

PTO/SB/21 (07-09)
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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission: 8

Application Number	13/248,028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh et al.
Art Unit	3667 Conf.: 8510
Examiner Name	Rudy, Andrew J.
Attorney Docket Number	RALEP037

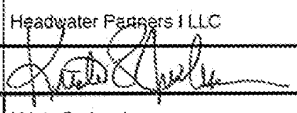
ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☑ Information Disclosure Statement
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
  - ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Attorney, Revocation Change of Correspondence Address
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
  - ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☐ Other Enclosure(s) (please identify below):

Remarks

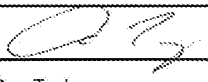
You are hereby authorized to charge any additional fee required or credit any overpayment to Deposit Account No. 50-5876

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Headwater Partners I LLC		
Signature			
Printed name	Krista S. Jacobsen		
Date	August 14, 2012	Reg. No.	59,374

CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being facsimile transmitted to the USPTO or deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below:

Signature			
Typed or printed name	Ann Taylor	Date	August 14, 2012

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
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P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	26WV-160514 [RALEP037]

CONFIRMATION NO. 8510

107265
Headwater Partners I LLC - Outside Firm 1
350 Marine Parkway, Suite 300
Redwood Shores, CA 94065

POA ACCEPTANCE LETTER

OC000000055443563

Date Mailed: 07/19/2012

NOTICE OF ACCEPTANCE OF POWER OF ATTORNEY

This is in response to the Power of Attorney filed 07/05/2012.

The Power of Attorney in this application is accepted. Correspondence in this application will be mailed to the above address as provided by 37 CFR 1.33.

/vvan/

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	26WV-160514 [RALEP037]

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

POWER OF ATTORNEY NOTICE

OC000000055443556

Date Mailed: 07/19/2012

NOTICE REGARDING CHANGE OF POWER OF ATTORNEY

This is in response to the Power of Attorney filed 07/05/2012.

- The Power of Attorney to you in this application has been revoked by the assignee who has intervened as provided by 37 CFR 3.71. Future correspondence will be mailed to the new address of record(37 CFR 1.33).

/vvan/

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

Doc Code: PET.POA.WDRW
Document Description: Petition to withdraw attorney or agent (SB83)

PTO/SB/83 (11-08)
Approved for use through 11/30/2011. OMB 0651-0035
U.S. Patent and Trademark Office, U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

REQUEST FOR WITHDRAWAL AS ATTORNEY OR AGENT AND CHANGE OF CORRESPONDENCE ADDRESS

Application Number	13/248,028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

To: **Commissioner for Patents**
P.O. Box 1450
Alexandria, VA 22313-1450

Please withdraw me as attorney or agent for the above identified patent application, and

☐ all the practitioners of record;

☐ the practitioners (with registration numbers) of record listed on the attached paper(s); or

☑ the practitioners of record associated with Customer Number: 69849

NOTE: The immediately preceding box should only be marked when the practitioners were appointed using the listed Customer Number.

The reason(s) for this request are those described in 37 CFR :

☐ 10.40(b)(1)	☐ 10.40(b)(2)	☐ 10.40(b)(3)	☑ 10.40(b)(4)
☐ 10.40(c)(1)(i)	☐ 10.40(c)(1)(ii)	☐ 10.40(c)(1)(iii)	☐ 10.40(c)(1)(iv)
☐ 10.40(c)(1)(v)	☐ 10.40(c)(1)(vi)	☐ 10.40(c)(2)	☐ 10.40(c)(3)
☐ 10.40(c)(4)	☐ 10.40(c)(5)	☐ 10.40(c)(6) Please explain below:	

Practitioners have been discharged by the client.

Certifications

Check each box below that is factually correct. WARNING: If a box is left unchecked, the request will likely not be approved.

1. ☑ I/We have given reasonable notice to the client, prior to the expiration of the response period, that the practitioner(s) intend to withdraw from employment.

2. ☑ I/We have delivered to the client or a duly authorized representative of the client all papers and property (including funds) to which the client is entitled.

3. ☑ I/We have notified the client of any responses that may be due and the time frame within which the client must respond.

Please provide an explanation, if necessary:

This collection of information is required by 37 CFR 1.36. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

PTO/SB/83 (11-08)
Approved for use through 11/30/2011. OMB 0651-0035
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REQUEST FOR WITHDRAWAL AS ATTORNEY OR AGENT AND CHANGE OF CORRESPONDENCE ADDRESS

Complete the following section only when the correspondence address will change. *Changes of address will only be accepted to an inventor or an assignee that has properly made itself of record pursuant to 37 CFR 3.71.*

Change the correspondence address and direct all future correspondence to:

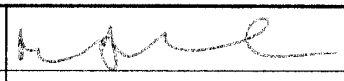
A. [✓] The address of the inventor or assignee associated with Customer Number: 107265

OR

B. [ ] Inventor or Assignee name	
Address	

City	State	Zip	Country
Telephone		Email	

I am authorized to sign on behalf of myself and all withdrawing practitioners.

Signature		
Name	Marc A. Sockol	Registration No. 40823
Address	Sheppard Mullin Richter & Hampton LLP, 379 Lytton Avenue	

City Palo Alto	State CA	Zip 94301-1479	Country US
Date July 10, 2012		Telephone No. 650-815-2600	

NOTE: ***Withdrawal is effective when approved rather than when received.***

This collection of information is required by 37 CFR 1.36. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

Electronic Acknowledgement Receipt

EFS ID:	13218817
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Anne Collette
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	10-JUL-2012
Filing Date:	28-SEP-2011
Time Stamp:	18:26:21
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1		26WV-160514.pdf	300366 7e55f5c4281ac94c6a24d50c157cc298e38dd255	yes	3

	Multipart Description/PDF files in .zip description		
	Document Description	**Start**	**End**
	Transmittal Letter	1	1
	Petition to withdraw attorney or agent (SB83)	2	3
Warnings:			
Information:			
	Total Files Size (in bytes):	300366	

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New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: TRAN.LET

Document Description: Transmittal Letter

PTO/SB/21 (07-09)
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Total Number of Pages in This Submission	3

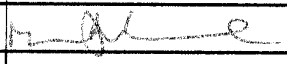
Application Number	13/248,028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☐ Information Disclosure Statement
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
  - ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Attorney, Revocation Change of Correspondence Address
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
  - ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☑ Other Enclosure(s) (please identify below):
  Request for Withdrawal as Attorney or Agent and Change of Correspondence Address

Remarks

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Sheppard, Mullin, Richter & Hampton LLP		
Signature			
Printed name	Marc A. Sockol		
Date	July 10, 2012	Reg. No.	40823

CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being transmitted to the USPTO via EFS-Web or deposited with the US Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below:

Signature			
Typed or printed name	Anne Collette	Date	July 10, 2012

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

POWER OF ATTORNEY TO PROSECUTE APPLICATIONS BEFORE THE USPTO

I hereby revoke all previous powers of attorney given in the application identified in the attached statement under 37 CFR 3.73(b).

I hereby appoint:

☑ Practitioners associated with the Customer Number: 107265

OR

☐ Practitioner(s) named below (If more than ten patent practitioners are to be named, then a customer number must be used):

Name	Registration Number	Name	Registration Number

as attorney(s) or agent(s) to represent the undersigned before the United States Patent and Trademark Office (USPTO) in connection with any and all patent applications assigned only to the undersigned according to the USPTO assignment records or assignment documents attached to this form in accordance with 37 CFR 3.73(b).

Please change the correspondence address for the application identified in the attached statement under 37 CFR 3.73(b) to:

☑ The address associated with Customer Number: 107265

OR

☐ Firm or Individual Name			
Address			
City		State	Zip
Country			
Telephone		Email	

Assignee Name and Address:

Headwater Partners I LLC
350 Marine Parkway, Suite 300
Redwood City, CA 94065 U.S.A.

A copy of this form, together with a statement under 37 CFR 3.73(b) (Form PTO/SB/96 or equivalent) is required to be filed in each application in which this form is used. The statement under 37 CFR 3.73(b) may be completed by one of the practitioners appointed in this form if the appointed practitioner is authorized to act on behalf of the assignee, and must identify the application in which this Power of Attorney is to be filed.

SIGNATURE of Assignee of Record

The individual whose signature and title is supplied below is authorized to act on behalf of the assignee

Signature		Date	July 5, 2012
Name	Gregory G. Raleigh	Telephone	650-517-2781
Title	Manager		

This collection of information is required by 37 CFR 1.31, 1.32 and 1.33. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 3 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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PTO/SB/96 (08-08)
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U.S. Patent and Trademark Office: U.S. DEPARTMENT OF COMMERCE
Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

STATEMENT UNDER 37 CFR 3.73(b)

Applicant/Patent Owner: Gregory G. Raleigh et al.

Application No./Patent No.: 13/248,028 Filed/Issue Date: September 28, 2011

Entitled: Enterprise Access Control and Accounting Allocation for Access Networks

Headwater Partners I LLC (Name of Assignee), a limited liability company (Type of Assignee, e.g., corporation, partnership, university, government agency, etc.)

states that it is:

1. [✓] the assignee of the entire right, title, and interest; or
2. [ ] an assignee of less than the entire right, title and interest (The extent (by percentage) of its ownership interest is _____ %)

in the patent application/patent identified above by virtue of either:

A. [✓] An assignment from the inventor(s) of the patent application/patent identified above. The assignment was recorded in the United States Patent and Trademark Office at Reel 027420, Frame 0184, or for which a copy therefore is attached.

OR

B. [ ] A chain of title from the inventor(s), of the patent application/patent identified above, to the current assignee as follows:

1. From: _____ To: _____
   The document was recorded in the United States Patent and Trademark Office at
   Reel _____, Frame _____, or for which a copy thereof is attached.
2. From: _____ To: _____
   The document was recorded in the United States Patent and Trademark Office at
   Reel _____, Frame _____, or for which a copy thereof is attached.
3. From: _____ To: _____
   The document was recorded in the United States Patent and Trademark Office at
   Reel _____, Frame _____, or for which a copy thereof is attached.

[ ] Additional documents in the chain of title are listed on a supplemental sheet.

[✓] As required by 37 CFR 3.73(b)(1)(i), the documentary evidence of the chain of title from the original owner to the assignee was, or concurrently is being, submitted for recordation pursuant to 37 CFR 3.11.

[NOTE: A separate copy (*i.e.*, a true copy of the original assignment document(s)) must be submitted to Assignment Division in accordance with 37 CFR Part 3, to record the assignment in the records of the USPTO. See MPEP 302.08]

The undersigned (whose title is supplied below) is authorized to act on behalf of the assignee.

Signature — July 5, 2012 (Date)

Krista S. Jacobsen, Reg. No. 59,374 (Printed or Typed Name) — 650-517-2798 (Telephone Number)

Attorney of Record (Title)

This collection of information is required by 37 CFR 3.73(b). The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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Date:	July 5, 2012
Send To:	Commissioner for Patents
Fax No.:	571-273-8300
From:	Krista S. Jacobsen, Head Counsel, Headwater Partners I LLC
Phone Number:	650-517-2798

Total Pages Including Cover: 3

Fax

Sir:

Following this cover sheet, please find form SB/80, granting power of attorney to prosecute applications before the USPTO to practitioners associated with the Customer Number 107265, and form SB/96, a statement under 37 C.F.R. § 3.73(b) establishing the right of assignee Headwater Partners I LLC to take action in application number 13/248,028.

Please let me know if you need any additional information to complete the Customer Number change in the application.

Sincerely,

Krista S. Jacobsen
Head Counsel, Headwater Partners I LLC
Reg. No. 59,374

PAGE 1/3 * RCVD AT 7/5/2012 8:43:03 PM [Eastern Daylight Time] * SVR:IW-PTOFAX-002/31 * DNIS:2738300 * CSID:16506108051 * DURATION (mm-ss):01-35

PTO/SB/08a (01-10)
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT
(Not for submission under 37 CFR 1.99)

Application Number	13248028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U.S.PATENTS						Remove
Examiner Initial*	Cite No	Patent Number	Kind Code[1]	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	5794142		1998-08-11	VANTTILA et al.	
	2	5903845		1999-05-11	BUHRMANN et al.	
	3	5933778		1999-08-03	BUHRMANN et al.	
	4	6317584		2001-11-13	ABU-AMARA et al.	
	5	6829596		2004-12-07	FRAZEE, Steve	
	6	7024200		2006-04-04	McKENNA et al.	
	7	8023425		2011-09-20	RALEIGH, Gregory G.	

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	2447
	Examiner Name	Joon H. Hwang
	Attorney Docket Number	26WV-160514 [RALEP037]

Examiner Initial*	Cite No	Publication Number	Kind Code[1]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
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Examiner Initial*	Cite No	Foreign Document Number[3]	Country Code[2]	Kind Code[4]	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear	T[5]
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Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T[5]
	1		☐

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Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. [2] Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). [3] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [4] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [5] Applicant is to place a check mark here if English language translation is attached.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)		
	Application Number	13248028
	Filing Date	2011-09-28
	First Named Inventor	Gregory G. Raleigh
	Art Unit	2447
	Examiner Name	Joon H. Hwang
	Attorney Docket Number	26WV-160514 [RALEP037]

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

☐ That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

☐ See attached certification statement.

☐ The fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ A certification statement is not submitted herewith.

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Marc A. Sockol/	Date (YYYY-MM-DD)	2012-05-10
Name/Print	Marc A. Sockol	Registration Number	40823

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these record s.

2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.

3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.

4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).

5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.

6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).

7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.

8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.

9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Electronic Acknowledgement Receipt

EFS ID:	12757773
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Anne Collette
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	11-MAY-2012
Filing Date:	28-SEP-2011
Time Stamp:	13:46:31
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Transmittal Letter	26WV-160514_Transmittal.pdf	88935 17d3459c9c6e92a3abb41da43d6ee98f36ab966c	no	1

Warnings:	
Information:	

2	Information Disclosure Statement (IDS) Form (SB08)	26WV-160514_IDS.pdf	612438 8e5d7efda783acbc2f32fb09a6d9d10ff535cd32	no	4
Warnings:					
Information:					
			Total Files Size (in bytes):	701373	

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Doc Code: TRAN.LET

Document Description: Transmittal Letter

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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission: 5

Application Number	13/248,028
Filing Date	2011-09-28
First Named Inventor	Gregory G. Raleigh
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☑ Information Disclosure Statement
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
  - ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Attorney, Revocation Change of Correspondence Address
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
  - ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☐ Other Enclosure(s) (please Identify below):

Remarks

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Sheppard, Mullin, Richter & Hampton LLP		
Signature			
Printed name	Marc A. Sockol		
Date	May 10, 2012	Reg. No.	40823

CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being facsimile transmitted to the USPTO or deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below:

Signature			
Typed or printed name	Anne Collette	Date	5/11/12

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UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	26WV-160514 [RALEP037]

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

POA ACCEPTANCE LETTER

OC000000053901692

Date Mailed: 04/26/2012

NOTICE OF ACCEPTANCE OF POWER OF ATTORNEY

This is in response to the Power of Attorney filed 04/17/2012.

The Power of Attorney in this application is accepted. Correspondence in this application will be mailed to the above address as provided by 37 CFR 1.33.

/qtran/

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

PTO/SB/80 (11-08)
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POWER OF ATTORNEY TO PROSECUTE APPLICATIONS BEFORE THE USPTO

I hereby revoke all previous powers of attorney given in the application identified in the attached statement under 37 CFR 3.73(b).

I hereby appoint:

☒ Practitioners associated with the Customer Number: 69849

OR

☐ Practitioner(s) named below (if more than ten patent practitioners are to be named, then a customer number must be used):

Name	Registration Number	Name	Registration Number

as attorney(s) or agent(s) to represent the undersigned before the United States Patent and Trademark Office (USPTO) in connection with any and all patent applications assigned only to the undersigned according to the USPTO assignment records or assignment documents attached to this form in accordance with 37 CFR 3.73(b).

Please change the correspondence address for the application identified in the attached statement under 37 CFR 3.73(b) to:

☒ The address associated with Customer Number: 69849

OR

☐ Firm or Individual Name			
Address			
City		State	Zip
Country			
Telephone		Email	

Assignee Name and Address:
Headwater Partners I, LLC
350 Marine Parkway, Suite 300
Redwood City, California 94065
U.S.A.

A copy of this form, together with a statement under 37 CFR 3.73(b) (Form PTO/SB/96 or equivalent) is required to be filed in each application in which this form is used. The statement under 37 CFR 3.73(b) may be completed by one of the practitioners appointed in this form if the appointed practitioner is authorized to act on behalf of the assignee, and must identify the application in which this Power of Attorney is to be filed.

SIGNATURE of Assignee of Record

The individual whose signature and title is supplied below is authorized to act on behalf of the assignee

Signature		Date: 18 MARCH	, 2011
Name	David R. Johnson	Telephone:	650-517-2782
Title	Chief Financial Officer		

This collection of information is required by 37 CFR 1.31, 1.32 and 1.33. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 3 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh, et al.	Joon H. Hwang
Serial No. 13/248,028	Art Unit: 2447
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

INFORMATION DISCLOSURE STATEMENT PURSUANT TO 37 C.F.R. §§1.97(b)

Sir:

In accordance with the duty of disclosure under 37 CFR §1.56 and pursuant to 37 CFR §§1.97-1.98, Applicant hereby notifies the U.S. Patent and Trademark Office of the references listed on the enclosed Form PTO-SB/08A. Pursuant to the USPTO's waiver of the requirements under 37 CFR 1.98(a)(2)(i) for submitting a copy of each cited U.S. patent, we are not submitting copies of U.S. patents and/or patent publications cited.

The present Information Disclosure Statement is being filed more than three months after the filing date but before receiving the first Office Action. Accordingly, no fee or certification is needed.

The submission of the listed documents is not intended as an admission that any such document constitutes prior art against the claims of the present application. Applicant reserves the right to dispute any of the listed documents as prior art during examination. Furthermore, Applicant does not waive any right to take any action that would be appropriate to antedate or otherwise remove any listed document as a competent reference against the claims of the present application. The submission of this Information Disclosure Statement is not to be

construed as a representation that a search has been made or that no other material information may exist.

The Examiner is requested to initial the enclosed Form PTO/SB/08A and return a copy thereof to the undersigned.

No fee is believed to be due relative to this submission, but if for any reason an insufficient fee has been paid, please charge the insufficiency to Deposit Account No. **50-4561**.

Respectfully submitted,

Date: April 17, 2012

By: _____

Marc A. Sockol, Reg. No. 40,823
Attorney for Applicants
Customer Number 69849
Sheppard, Mullin, Richter & Hampton LLP
379 Lytton Avenue
Palo Alto, CA 94301-1432
Telephone: (650) 815-2600

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: April 17, 2012 By: Linda K. Brost

Linda K. Brost

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Substitute for form 1449A/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 1 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		5,577,100	11-19-1996	McGREGOR et al	
		5,892,900	04-06-1999	GINTER et al	
		5,940,472	08-17-1999	NEWMAN et al	
		6,047,268	04-04-2000	BARTOLI et al	
		6,078,953	06-20-2000	VAID et al	
		6,098,878	08-08-2000	DENT et al	
		6,141,686	10-31-2000	JACKOWSKI et al	
		6,148,336	11-14-2000	THOMAS et al	
		6,198,915	03-06-2001	McGREGOR et al	
		6,263,055	07-17-2001	GARLAND et al	
		6,449,479	09-10-2002	SANCHEZ, Eduardo	
		6,532,235	03-11-2003	BENSON et al	
		6,532,579	03-11-2003	SATO et al	
		6,539,082	03-25-2003	LOWE et al	
		6,563,806	05-13-2003	YANO et al	
		6,574,321	06-03-2003	COX et al	
		6,603,969	08-05-2003	VUORISTO et al.	
		6,639,975	10-28-2003	O'NEAL et al	
		6,650,887	11-18-2003	McGREGOR et al	
		6,651,101	11-18-2003	GAI et al	

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] *(if known)*	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]
	F01	EP 1463238 A1	09-29-2004	Alcatel		
	F02	EP 1739518 A1	01-03-2007	Research In Motion Limited		
	F03	EP 1772988 A1	04-11-2007	Huawei Technologies Co., LTD.		

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. [1]Applicant's unique citation designation number (optional). [2]See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. [3]Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4]For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5]Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. [6]Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

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PTO/SB/08a (07-09)
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 2 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		6,658,254	12-02-2003	PURDY et al.	
		6,684,244	01-27-2004	GOLDMAN et al	
		6,725,031	04-20-2004	WATLER et al	
		6,785,889	08-31-2004	WILLIAMS, Peter	
		6,829,696	12-07-2004	BALMER et al	
		6,920,455	07-19-2005	WESCHLER, Paul	
		6,952,428	10-04-2005	NECKA et al	
		6,965,667	11-15-2005	TRABANDT et al	
		6,996,076	02-07-2006	FORBES et al	
		6,998,985	02-14-2006	REISMAN et al	
		7,027,408	04-11-2006	NABKEL, et al.	
		7,042,988	05-09-2006	JUITT et al	
		7,058,968	06-06-2006	ROWLAND et al	
		7,092,696	08-15-2006	HOSAIN et al	
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Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]
	F04	EP 1978772 A1	10-08-2008	British Telecomm. Public Ltd. Co.		
	F05	WO 1999/065185 A3	12-16-1999	British Telecomm. Public Ltd. Co.		
	F06	WO 2003/014891 A2	02-20-2003	The Boeing Company		

Examiner Signature		Date Considered	

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 3 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Document Number Number-Kind Code[2] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
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	F07	WO 2003/058880 A1	07-17-2003	Telia AB		
	F08	WO 2004/028070 A1	04-01-2004	Credant Technologies, Inc.		
	F09	WO 2004/077797 A2	09-10-2004	Boston Comm. Group, Inc.		

Examiner Signature		Date Considered	

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Sheet 4 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

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	F10	WO 2004/095753 A2	11-04-2004	Motorola Inc.		
	F11	WO 2006/004467 A1	01-12-2006	Telefonaktiebolaget LM Ericsson		
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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 5 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

U. S. PATENT DOCUMENTS

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	F15	WO 2006/130960 A1	12-14-2006	Mobidia, Inc.		

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT

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Sheet 6 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F16	WO 2007/001833 A2	01-04-2007	Symbol Technologies, Inc.		
	F17	WO 2007/014630 A1	02-08-2007	Telefonaktiebolaget LM Ericsson		
	F18	WO 2007/018363 A1	02-15-2007	Upresto, Inc.		

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Sheet 7 of 17

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Application Number	13/248,028
Filing Date	September 28, 2011
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Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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		2005/0055309	03-10-2005	WILLIAMS et al	
		2005/0060266	03-17-2005	DEMELLO et al	
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	F19	WO 2007/053848 A1	05-10-2007	Mobile Armor, LLC		
	F20	WO 2007/069245 A2	06-21-2007	Yoggie Sec. Systems, Inc.		
	F21	WO 2007/107701 A2	09-27-2007	British Telecomm. Public Ltd. Co.		

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Sheet 8 of 17

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Art Unit	2447
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Attorney Docket Number	26WV-160514 [RALEP037]

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		2006/0034256	02-16-2006	ADDAGATLA et al	
		2006/0040642	02-23-2006	BORIS et al	
		2006/0045245	03-02-2006	AARON et al	
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Sheet 9 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

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	F28	WO 2010/088413 A1	08-05-2010	Headwater Partners I LLC		

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Examiner Initials*	Cite No.[1]	Foreign Patent Document Country Code[3] "Number[4] "Kind Code[5] (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. [1]Applicant's unique citation designation number (optional). [2]See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. [3]Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4]For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5]Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. [6]Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

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PTO/SB/08b (07-09)
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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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Substitute for form 1449B/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 15 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
	N01	Author Unknown, 3GPP TS 23.203, V8.4.0, 3rd Generation Partnership Project; Technical Specification Group Services and System Aspects; Policy and Charging Control Architecture (Release 8), December 2008	
	N02	Author Unknown, 3GPP TS 23.401, V8.4.0, 3rd Generation Partnership Project; Technical Specification Group Services and System Aspects; General Packer Radio Service (GPRS) Enhancements for Evolved Universal Terrestrial Radio Access Network (E-UTRAN) Access (Release 8), December 2008	
	N03	Author Unknown, "Overview of GSM, GPRS, and UMTS," Chapter 2, November 4, 2008	
	N04	Author Unknown, Hewlett-Packard, "IP Multimedia Services Charging," a White Paper from HP, January 2006	
	N05	Author Unknown, Kindle™ User's Guide 3rd Edition, Copyright 2004-2009	
	N06	No author/date indicated. "Data Roaming Tariffs - Transparency Measures." Obtained from EUROPA - Europe's Information Society Thematic Portal website, June 24, 2011: "http://ec.europa.eu/information_society/activities/roaming/data/measures/index_en.htm."	
	N07	ALONISTIOTI et al., "Intelligent Architectures Enabling Flexible Service Provision and Adaptability," 2002	
	N08	CHANDRASEKHAR et al., "Femtocell Networks: A Survey," June 28, 2008	
	N09	CHAOUCHI et al., "Policy Based Networking in the Integration Effort of 4G Networks and Services," 2004 IEEE	
	N10	DIKAIAKOS et al., "A Distributed Middleware Infrastructure for Personalized Services," November 24, 2003	

Examiner Signature		Date Considered	

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[1] Applicant's unique citation designation number (optional). [2] Applicant is to place a check mark here if English language Translation is attached.

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If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

PTO/SB/08b (07-09)
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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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Substitute for form 1449B/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 16 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
	N11	FAROOQ et al., "An IEEE 802.16 WiMax Module for the NS-3 Simulator," March 2-6, 2009	
	N12	HAN et al., "Information Collection Services for Qos-Aware Mobile Applications," 2005	
	N13	HARTMANN et al., "Agent-Based Banking Transactions & Information Retrieval - What About Performance Issues?" 1999	
	N14	HOSSAIN et al., "Gain-Based Selection of Ambient Media Services in Pervasive Environments," Mobile Networks and Applications. 03 October 2008	
	N15	LI, Yu, "Dedicated E-Reading Device: The State of the Art and The Challenges," Scroll, Vol. 1, No. 1, 2008	
	N16	KNIGHT et al., "Layer 2 and 3 Virtual Private Networks: Taxonomy, Technology, and Standarization Efforts," IEEE Communications Magazine, June 2004	
	N17	KOUTSOPOULOU et al., "Middleware Platform for the Support of Charging Reconfiguration Actions," 2005	
	N18	KYRIAKAKOS et al., "Ubiquitous Service Provision in Next Generation Mobile Networks," Proceedings of the 13th IST Mobile and Wireless Communications Summit, Lyon, France, June 2004	
	N19	NILSSON et al., "A Novel MAC Scheme for Solving the QoS Parameter Adjustment Problem in IEEE802.11e EDCA," February 2006	
	N20	OPPLIGER, Rolf, "Internet Security: Firewalls and Bey," Communications of the ACM, May 1997, Vol. 40. No. 5	

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] Applicant's unique citation designation number (optional). [2] Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

PTO/SB/08b (07-09)
Approved for use through 07/31/2012. OMB 0651-0031
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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Substitute for form 1449B/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet 17 of 17

Complete if Known	
Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
	N21	RAO et al., "Evolution of Mobile Location-Based Services," Communication of the ACM, December 2003	
	N22	STEGLICH, Stephan, "I-Centric User Interaction," November 21, 2003	
	N23	VAN EIJK, et al., "GigaMobile, Agent Technology for Designing Personalized Mobile Service Brokerage," July 1, 2002	
	N24	ZHU et al., "A Survey of Quality of Service in IEEE 802.11 Networks," IEEE Wireless Communications, August 2004	
	N25	Search Report and Written Opinion mailed 17 January 2012 from International Serial Number PCT/US2011/001683 filed 28 September 2011	

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.
[1] Applicant's unique citation designation number (optional). [2] Applicant is to place a check mark here if English language Translation is attached.
This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

PATENT COOPERATION TREATY

From the INTERNATIONAL SEARCHING AUTHORITY

To:
MARC A. SOCKOL
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
390 LYTTON AVENUE
PALO ALTO, CA 94301

PCT

NOTIFICATION OF TRANSMITTAL OF THE INTERNATIONAL SEARCH REPORT AND THE WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY, OR THE DECLARATION

(PCT Rule 44.1)

	Date of mailing *(day/month/year)* 17 JAN 2012
Applicant's or agent's file reference 26WV-160514 [RALEP037]	**FOR FURTHER ACTION** See paragraphs 1 and 4 below
International application No. PCT/US 11/01683	International filing date *(day/month/year)* 28 September 2011 (28.09.2011)
Applicant HEADWATER PARTNERS I LLC	

1. ☒ The applicant is hereby notified that the international search report and the written opinion of the International Searching Authority have been established and are transmitted herewith.

   Filing of amendments and statement under Article 19:
   The applicant is entitled, if he so wishes, to amend the claims of the international application (see Rule 46):

   When? The time limit for filing such amendments is normally two months from the date of transmittal of the international search report.

   Where? Directly to the International Bureau of WIPO, 34 chemin des Colombettes 1211 Geneva 20, Switzerland, Facsimile No.: +41 22 338 82 70

   For more detailed instructions, see *PCT Applicant's Guide*, International Phase, paragraphs 9.004 – 9.011.

2. ☐ The applicant is hereby notified that no international search report will be established and that the declaration under Article 17(2)(a) to that effect and the written opinion of the International Searching Authority are transmitted herewith.

3. ☐ **With regard to any protest** against payment of (an) additional fee(s) under Rule 40.2, the applicant is notified that:

   ☐ the protest together with the decision thereon has been transmitted to the International Bureau together with any request to forward the texts of both the protest and the decision thereon to the designated Offices.

   ☐ no decision has been made yet on the protest; the applicant will be notified as soon as a decision is made.

4. **Reminders**

   The applicant may submit comments on an informal basis on the written opinion of the International Searching Authority to the International Bureau. The International Bureau will send a copy of such comments to all designated Offices unless an international preliminary examination report has been or is to be established. Following the expiration of 30 months from the priority date, these comments will also be made available to the public.

   Shortly after the expiration of **18 months** from the priority date, the international application will be published by the International Bureau. If the applicant wishes to avoid or postpone publication, a notice of withdrawal of the international application, or of the priority claim, must reach the International Bureau before the completion of the technical preparations for international publication (Rules 90*bis*.1 and 90*bis*.3).

   Within **19 months** from the priority date, but only in respect of some designated Offices, a demand for international preliminary examination must be filed if the applicant wishes to postpone the entry into the national phase **until 30 months** from the priority date (in some Offices even later); otherwise, the applicant must, **within 20 months** from the priority date, perform the prescribed acts for entry into the national phase before those designated Offices.

   In respect of other designated Offices, the time limit of **30 months** (or later) will apply even if no demand is filed within 19 months.

   For details about the applicable time limits, Office by Office, see www.wipo.int/pct/en/texts/time_limits.html and the *PCT Applicant's Guide*, National Chapters.

Name and mailing address of the ISA/ Mail Stop PCT, Attn: ISA/US Commissioner for Patents P.O. Box 1450, Alexandria, Virginia 22313-1450 Facsimile No. 571-273-3201	Authorized officer Lee W. Young PCT Helpdesk: 571-272-4300 Telephone No. PCT OSP: 571-272-7774

Form PCT/ISA/220 (July 2010)

PATENT COOPERATION TREATY

PCT

INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference 26WV-160514 [RALEP037]	FOR FURTHER ACTION	see Form PCT/ISA/220 as well as, where applicable, item 5 below.
International application No. PCT/US 11/01683	International filing date *(day/month/year)* 28 September 2011 (28.09.2011)	(Earliest) Priority Date *(day/month/year)* 28 September 2010 (28.09.2010)
Applicant HEADWATER PARTNERS I LLC		

This international search report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This international search report consists of a total of 9 sheets.

☐ It is also accompanied by a copy of each prior art document cited in this report.

1. **Basis of the report**

a. With regard to the **language**, the international search was carried out on the basis of:

☒ the international application in the language in which it was filed.

☐ a translation of the international application into _____ which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1(b)).

b. ☐ This international search report has been established taking into account the **rectification of an obvious mistake** authorized by or notified to this Authority under Rule 91 (Rule 43.6*bis*(a)).

c. ☐ With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, see Box No. I.

2. ☐ **Certain claims were found unsearchable** (see Box No. II).

3. ☐ **Unity of invention is lacking** (see Box No. III).

4. With regard to the **title**,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the **abstract**,

☐ the text is approved as submitted by the applicant.

☒ the text has been established, according to Rule 38.2, by this Authority as it appears in Box No. IV. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. With regard to the **drawings**,

a. the figure of the **drawings** to be published with the abstract is Figure No. 1

☒ as suggested by the applicant.

☐ as selected by this Authority, because the applicant failed to suggest a figure.

☐ as selected by this Authority, because this figure better characterizes the invention.

b. ☐ none of the figures is to be published with the abstract.

Form PCT/ISA/210 (first sheet) (July 2009)

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 11/01683

Box No. IV Text of the abstract (Continuation of item 5 of the first sheet)

Enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device, and determining an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device, and reporting the monitored service usage activity to a network element, in which the network element determines an enterprise and consumer billing allocation for the monitored service usage activity.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 11/01683

A. CLASSIFICATION OF SUBJECT MATTER
IPC(8) - G06F 17/00 (2011.01)
USPC - 726/1
According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
USPC: 726/1

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched
USPC: 726/1-5 (keyword limited - see terms below)

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
PubWEST(USPT,PGPB,EPAB,JPAB); Google
Search Terms: Monitor, tracking, usage, design, policy, enterprise, service, trigger, interface

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2010/0191612 A1 (Raleigh) 29 July 2010 (29.07.2010), para [0083], [0090], [0131], [0170], [0171], [0217], [0254], [0255], [0279], [0325], [0392], [0497]	1 - 25
A	US 2008/0319879 A1 (Carroll et al.) 25 December 2008 (25.12.2008), entire document	1 - 25
A	US 2008/0207167 A1 (Bugenhagen) 28 August 2008 (28.08.2008), entire document	1 - 25

☐ Further documents are listed in the continuation of Box C. ☐

* Special categories of cited documents:
"A" document defining the general state of the art which is not considered to be of particular relevance
"E" earlier application or patent but published on or after the international filing date
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
"O" document referring to an oral disclosure, use, exhibition or other means
"P" document published prior to the international filing date but later than the priority date claimed
"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
"&" document member of the same patent family

Date of the actual completion of the international search	Date of mailing of the international search report
03 January 2012 (03.01.2012)	17 JAN 2012
Name and mailing address of the ISA/US Mail Stop PCT, Attn: ISA/US, Commissioner for Patents P.O. Box 1450, Alexandria, Virginia 22313-1450 Facsimile No. 571-273-3201	Authorized officer: Lee W. Young PCT Helpdesk: 571-272-4300 PCT OSP: 571-272-7774

Form PCT/ISA/210 (second sheet) (July 2009)

PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

To: MARC A. SOCKOL
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
390 LYTTON AVENUE
PALO ALTO, CA 94301

PCT

WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43*bis*.1)

Date of mailing *(day/month/year)*	17 JAN 2012
Applicant's or agent's file reference 26WV-160514 [RALEP037]	**FOR FURTHER ACTION** See paragraph 2 below

International application No.	International filing date *(day/month/year)*	Priority date *(day/month/year)*
PCT/US 11/01683	28 September 2011 (28.09.2011)	28 September 2010 (28.09.2010)

International Patent Classification (IPC) or both national classification and IPC
IPC(8) - G06F 17/00 (2011.01)
USPC - 726/1

Applicant HEADWATER PARTNERS I LLC

1. This opinion contains indications relating to the following items:

- [X] Box No. I Basis of the opinion
- [ ] Box No. II Priority
- [ ] Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- [ ] Box No. IV Lack of unity of invention
- [X] Box No. V Reasoned statement under Rule 43*bis*.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- [ ] Box No. VI Certain documents cited
- [ ] Box No. VII Certain defects in the international application
- [ ] Box No. VIII Certain observations on the international application

2. **FURTHER ACTION**

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1 *bis*(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

Name and mailing address of the ISA/US	Date of completion of this opinion	Authorized officer:
Mail Stop PCT, Attn: ISA/US Commissioner for Patents P.O. Box 1450, Alexandria, Virginia 22313-1450 Facsimile No. 571-273-3201	03 January 2012 (03.01.2012)	Lee W. Young PCT Helpdesk: 571-272-4300 PCT OSP: 571-272-7774

Form PCT/ISA/237 (cover sheet) (July 2011)

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/01683

Box No. I Basis of this opinion

1. With regard to the **language**, this opinion has been established on the basis of:

   ☒ the international application in the language in which it was filed.

   ☐ a translation of the international application into _____ which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1(b)).

2. ☐ This opinion has been established taking into account the **rectification of an obvious mistake** authorized by or notified to this Authority under Rule 91 (Rule 43*bis*.1(a))

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, this opinion has been established on the basis of a sequence listing filed or furnished:

   a. (means)

      ☐ on paper

      ☐ in electronic form

   b. (time)

      ☐ in the international application as filed

      ☐ together with the international application in electronic form

      ☐ subsequently to this Authority for the purposes of search

4. ☐ In addition, in the case that more than one version or copy of a sequence listing has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.

5. Additional comments:

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/01683

Box No. V **Reasoned statement under Rule 43*bis*.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement**

1. Statement

Novelty (N)	Claims	None.	YES
	Claims	1 - 25	NO
Inventive step (IS)	Claims	None.	YES
	Claims	1 - 25	NO
Industrial applicability (IA)	Claims	1 - 25	YES
	Claims	None.	NO

2. Citations and explanations:

Claims 1 - 25 lack novelty under PCT Article 33(2) as being anticipated by US 2010/0191612 A1 (Raleigh).

As per claim 1, Raleigh discloses a network system for providing network access service notification messages containing information about a network access activity of an end-user device, the network system comprising: a first service design center configured to: obtain a first network access notification message policy comprising a first network access trigger condition and an associated first network access notification message, the first network access trigger condition comprising one or more current or requested end-user device network access activities, the first network access notification message comprising notification information to be presented to a user through a user interface (para [0170] and [0171]), receive a trigger condition indication from a network element (para [0254]), associate the trigger condition indication with the first network access notification message (para [0255]), and present the notification information to the user through the user interface; a network provisioning instruction translator configured to: receive, from the first service design center, the first network access trigger condition (para [0279] and [0325]), and determine, based on the first network access trigger condition, one or more network access trigger identification instructions (para [0497]); and a network provisioning system configured to communicate the one or more network access trigger identification instructions to one or more network elements responsible for monitoring the service usage, the one or more network elements responsible for monitoring the service usage configured to (para [0131]): execute the one or more network access trigger identification instructions to identify when the first network access trigger condition occurs (para [0202]), and send the trigger condition indication to the first service design center (para [0266] and [0307]).

As per claim 2, Raleigh discloses a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set (para [0217] and [0392]).

As per claim 3, Raleigh discloses the master service design center is further configured to define a second notification policy design capability set for a second service design center, the second notification policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set (para [0277]).

As per claim 4, Raleigh discloses the first network access trigger condition comprises a period of time since a previous network access trigger condition, and the first network access notification message comprises a real-time or near-real-time measure of an amount of service usage or a cost of service usage (para [0279], [0438] and [0524]).

As per claim 5, Raleigh discloses the first network access trigger condition comprises an amount of service usage or a cost of service usage, and the first network access notification message comprises a real-time or near-real-time measure of an aggregate service usage or an aggregate cost (para [0279] and [0393]).

As per claim 6, Raleigh discloses the service design center is further configured to send a user notification message to a user of the end-user device based on the first network access notification message (para [0115] and [0238]).

As per claim 7, Raleigh discloses the first service design center is hosted on an operator network (para [0083]).

As per claim 8, Raleigh discloses first service design center is hosted on an enterprise network (para [0083] and [0090]).

As per claim 9, Raleigh discloses the first network access trigger condition comprises a service usage limit or a specified amount of accrued cost (para [0279], [0292] and [0494]).

As per claim 10, Raleigh discloses the first network access trigger condition comprises a roaming service usage limit or specified amount of accrued roaming service cost (para [0193] and [0279]).

As per claim 11, Raleigh discloses the one or more network elements responsible for monitoring the service usage are configured to classify service usage by device application, and the first network access trigger condition comprises one or more device application access activities (para [0279] and [0529]).

---(continued in Supplemental Boxes)---

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/01683

Supplemental Box

In case the space in any of the preceding boxes is not sufficient.
Continuation of:

Box No. V 2. Citations and explanations:

As per claim 12, Raleigh discloses the one or more network elements responsible for monitoring service usage are configured to classify service usage by network destination, and the first network access trigger condition comprises one or more device network destination access activities (para [0203] and [0229]).

As per claim 13, Raleigh discloses the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in a wireless operator network (para [0228]).

As per claim 14, Raleigh discloses the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in an enterprise access network (para [0090] and [0228]).

As per claim 15, Raleigh discloses the one or more network elements responsible for monitoring service usage comprise a service usage monitor located on a wireless device (para [0233]).

As per claim 16, Raleigh discloses the first network access notification message policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials (para [0374]), and the service design center is further configured to obtain a second network access notification message policy comprising a plurality of second network access trigger conditions and [0261], for each of the plurality of second network access trigger conditions (para [0108]), an associated second network access notification message, the second network access notification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials (para [0392] and [0434]).

As per claim 17, Raleigh discloses the first network access notification message policy comprises a subset of the second network access notification message policy (para [0081]).

As per claim 18. Raleigh discloses a network system for classifying an accounting of access network service usage by an end-user device, the network system comprising: a first service design center configured to: obtain a first accounting split classification policy defining classification rules for dividing an overall access network service usage into an enterprise service usage allocation and a personal service usage allocation (para [0075] and [0440]); a network provisioning instruction translator configured to: receive the first accounting split classification policy from the first service design center (para [0279]), and determine, based on the first accounting split classification policy, one or more network service usage classification and reporting instructions (para [0079]); a network provisioning system configured to communicate the one or more network service usage classification and reporting instructions to one or more network elements responsible for classifying the service usage, the one or more network elements responsible for classifying the service usage configured to (para [0337]): execute the one or more network service usage classification and reporting instructions to determine the enterprise service usage allocation and the personal service usage allocation (para [0079]), and generate a service usage report (para [0233]); and a service usage accounting system configured to receive the service usage report and, based on the usage report, accrue the enterprise service usage allocation and accrue the personal service usage allocation (para [0207] and [0392]).

As per claim 19, Raleigh discloses a master service design center configured to define a first accounting policy design capability set for the first service design center, the first accounting policy design capability set comprising a first subset of a master policy capability set (para [0207] and [0392]).

As per claim 20, Raleigh discloses the master service design center is further configured to define a second accounting policy design capability set for a second service design center, the second accounting policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set (para [0207] and [0392]).

As per claim 21, Raleigh discloses the first accounting split classification policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials (para [0374]), and the service design center is further configured to obtain a second accounting split classification policy (para [0075] and [0440]), the second accounting split classification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials (para [0392] and [0434]).

As per claim 22, Raleigh discloses the first accounting split classification policy comprises a subset of the second accounting split classification policy (para [0440]).

As per claim 23, Raleigh discloses a communications device comprising: a secure enterprise application execution environment comprising: memory configured to support secure execution of an enterprise software application, the enterprise software application approved by an enterprise to execute in the secure enterprise application execution environment and to access one or more secure enterprise services (para [0148]), and a secure enterprise communication link configured to provide communication between the enterprise software application and one or more network resources and servers associated with at least one of the one or more secure enterprise services (para [0259]), and a personal application execution environment comprising memory to support execution of personal software applications not approved by the enterprise to execute in the secure enterprise application execution environment or to access the one or more secure enterprise services (para [0268]); and one or more device agents configured to: receive a personal service plan offer from a network element, the personal service plan offer comprising one or more service plans to enable the communications device to access available network services accounted to a personal service usage allocation (para [0258]), present the personal service plan offer to a user of the communications device through a user interface of the communications device (para [0254]), obtain a user response to the personal service plan offer through the user interface of the communications device (para [0292]), and send the user response to the network element (para [0252]).

---continued on next page---

WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/US 11/01683

Supplemental Box

In case the space in any of the preceding boxes is not sufficient.
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Box No. V 2. Citations and explanations:

As per claim 24, Raleigh discloses a network system for providing network access service control for an end-user device, the network system comprising: a first service design center configured to obtain a first network access policy comprising one or more network access service permissions associated with the end-user device or a user of the end-user device (para [0202]); a network provisioning instruction translator configured to: receive, from the first service design center, the first network access policy, and determine, based on the first network access policy, one or more network access policy enforcement instructions (para [0202] and [0203]); and a network provisioning system configured to communicate the one or more network access policy enforcement instructions to one or more network elements responsible for controlling network access, the one or more network elements responsible for controlling the service usage configured to (para [0096]): execute the one or more network access policy enforcement instructions to enforce network access service permissions and limits (para [0109]).

As per claim 25, Raleigh discloses a master service design center configured to define a first control policy design capability set for the first service design center, the first control policy design capability set comprising a first subset of a master policy capability set (para [0217] and [0392]).

Claims 1 - 25 have industrial applicability as defined by PCT Article 33(4) because the subject matter can be made or used in industry.

Electronic Acknowledgement Receipt

EFS ID:	12565067
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Linda Brost
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	17-APR-2012
Filing Date:	28-SEP-2011
Time Stamp:	20:48:08
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1		160514-RALEP037-POAwith3-73bStmtandIDS-041712.pdf	1139227 c6d85be9621f61a3bc6f4ef4de64db24de76c857	yes	32

	Multipart Description/PDF files in .zip description		
	Document Description	**Start**	**End**
	Transmittal Letter	1	1
	Assignee showing of ownership per 37 CFR 3.73(b).	2	3
	Power of Attorney	4	4
	Miscellaneous Incoming Letter	5	6
	Information Disclosure Statement (IDS) Form (SB08)	7	23
	Non Patent Literature	24	32

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2	Foreign Reference	F01-EP1463238A1.pdf	2958832 83136f476a570805779c9b2b4e6e887376d8be30	no	14
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3	Foreign Reference	F02-EP1739518A1.pdf	1362237 02b926b32a0b86912431f64d534af96df87287b6	no	18
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6	Foreign Reference	F05-WO1999-065185A3.pdf	2378049 a6d97c2c284b5b398757bf24b4f565fb18623db1	no	56
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7	Foreign Reference	F06-WO2003-014891A2.pdf	4549110 9b7b08259400a67f111b39481a46102957317185	no	36

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8	Foreign Reference	F07-WO2003-058880A1.pdf	2866566 4f2718d736ded10e4654f9b449eff2d35551a8a6	no	21
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9	Foreign Reference	F08-WO2004-028070A1.pdf	5474398 bd62c96bc7cbaae1cc8ce8fc64f5bb223cb1cfed	no	38
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10	Foreign Reference	F09-WO2004-077797A2.pdf	12830803 84894546ece6df0839b520eb533675fd4ecd823d	no	79
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12	Foreign Reference	F11-WO2006-004467A1.pdf	4668357 6800596f20ce5b117c2a03f68435ad65099c42d1	no	29
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30	Non Patent Literature	N01-3GPPTS23-203TechSpec.pdf	1125084 dc12a62764234830 44ef6b353dedfad514f21b6c	no	111
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If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
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PTO/SB/21 (07-09)
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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission	32 + refs.

Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447 Conf. No. 8510
Examiner Name	Joon H. Hwang
Attorney Docket Number	26WV-160514 [RALEP037]

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Amendment/Reply
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☒ Information Disclosure Statement with PTO/SB/08a/b (19 pgs.)
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
- ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☒ Power of Atty. to Prosecute Applications [PTO/SB/80] (1 pg.)
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s)
- ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC (Appeal Notice, Brief, Reply Brief)
- ☐ Proprietary Information
- ☐ Status Letter
- ☒ Other Enclosure(s) (please Identify below):

  Statement Under 37 CFR 3.73(b) (2 pgs.); copy of International Search Report/Written Opinion for PCT/US11/001683 (9 pgs.); copies of foreign and non-patent literature prior art references (52 total)

Remarks

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SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Sheppard, Mullin, Richter & Hampton LLP Customer No. 69849		
Signature			
Printed name	Marc A. Sockol		
Date	April 17, 2012	Reg. No.	40,823

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this correspondence is being filed electronically via EFS-Web addressed to the Commissioner for Patents on the date shown below:

Signature	Linda K. Brost		
Typed or printed name	Linda K. Brost	Date	April 17, 2012

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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STATEMENT UNDER 37 CFR 3.73(b)

Applicant/Patent Owner: Gregory G. Raleigh, et al.

Application No./Patent No.: 13/248,028 Filed/Issue Date: September 28, 2011

Titled: Enterprise Access Control and Accounting Allocation for Access Networks

Headwater Partners I, LLC (Name of Assignee), a limited liability company (Type of Assignee, e.g., corporation, partnership, university, government agency, etc.)

states that it is:

1. [X] the assignee of the entire right, title, and interest in;

2. [ ] an assignee of less than the entire right, title, and interest in (The extent (by percentage) of its ownership interest is _____ %); or

3. [ ] the assignee of an undivided interest in the entirety of (a complete assignment from one of the joint inventors was made) the patent application/patent identified above, by virtue of either:

A. [X] An assignment from the inventor(s) of the patent application/patent identified above. The assignment was recorded in the United States Patent and Trademark Office at Reel 027420, Frame 0184, or for which a copy therefore is attached.

OR

B. [ ] A chain of title from the inventor(s), of the patent application/patent identified above, to the current assignee as follows:

1. From: _____ To: _____
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[ ] Additional documents in the chain of title are listed on a supplemental sheet(s).

[X] As required by 37 CFR 3.73(b)(1)(i), the documentary evidence of the chain of title from the original owner to the assignee was, or concurrently is being, submitted for recordation pursuant to 37 CFR 3.11.

[NOTE: A separate copy (*i.e.*, a true copy of the original assignment document(s)) must be submitted to Assignment Division in accordance with 37 CFR Part 3, to record the assignment in the records of the USPTO. See MPEP 302.08]

The undersigned (whose title is supplied below) is authorized to act on behalf of the assignee.

Signature — April 17, 2012 (Date)

Marc A. Sockol, Reg. No. 40,823 (Printed or Typed Name) — Attorney of Record (Title)

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7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (*i.e.*, GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
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www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	26WV-160514 [RALEP037]

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

PUBLICATION NOTICE



Title: Enterprise Access Control and Accounting Allocation for Access Networks

Publication No.US-2012-0084184-A1
Publication Date:04/05/2012

NOTICE OF PUBLICATION OF APPLICATION

The above-identified application will be electronically published as a patent application publication pursuant to 37 CFR 1.211, et seq. The patent application publication number and publication date are set forth above.

The publication may be accessed through the USPTO's publically available Searchable Databases via the Internet at www.uspto.gov. The direct link to access the publication is currently http://www.uspto.gov/patft/.

The publication process established by the Office does not provide for mailing a copy of the publication to applicant. A copy of the publication may be obtained from the Office upon payment of the appropriate fee set forth in 37 CFR 1.19(a)(1). Orders for copies of patent application publications are handled by the USPTO's Office of Public Records. The Office of Public Records can be reached by telephone at (703) 308-9726 or (800) 972-6382, by facsimile at (703) 305-8759, by mail addressed to the United States Patent and Trademark Office, Office of Public Records, Alexandria, VA 22313-1450 or via the Internet.

In addition, information on the status of the application, including the mailing date of Office actions and the dates of receipt of correspondence filed in the Office, may also be accessed via the Internet through the Patent Electronic Business Center at www.uspto.gov using the public side of the Patent Application Information and Retrieval (PAIR) system. The direct link to access this status information is currently http://pair.uspto.gov/. Prior to publication, such status information is confidential and may only be obtained by applicant using the private side of PAIR.

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Office of Data Managment, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number: 13/248,028

APPLICATION AS FILED - PART I

FOR	(Column 1) NUMBER FILED	(Column 2) NUMBER EXTRA	SMALL ENTITY RATE($)	SMALL ENTITY FEE($)	OR	OTHER THAN SMALL ENTITY RATE($)	OTHER THAN SMALL ENTITY FEE($)
BASIC FEE (37 CFR 1.16(a), (b), or (c))	N/A	N/A	N/A	95		N/A	
SEARCH FEE (37 CFR 1.16(k), (i), or (m))	N/A	N/A	N/A	310		N/A	
EXAMINATION FEE (37 CFR 1.16(o), (p), or (q))	N/A	N/A	N/A	125		N/A	
TOTAL CLAIMS (37 CFR 1.16(i))	25 minus 20 =	* 5	x 30 =	150	OR		
INDEPENDENT CLAIMS (37 CFR 1.16(h))	4 minus 3 =	* 1	x 125 =	125			
APPLICATION SIZE FEE (37 CFR 1.16(s))	If the specification and drawings exceed 100 sheets of paper, the application size fee due is $310 ($155 for small entity) for each additional 50 sheets or fraction thereof. See 35 U.S.C. 41(a)(1)(G) and 37 CFR 1.16(s).			0.00			
MULTIPLE DEPENDENT CLAIM PRESENT (37 CFR 1.16(j))				0.00			
* If the difference in column 1 is less than zero, enter "0" in column 2.			TOTAL	805		TOTAL	

APPLICATION AS AMENDED - PART II

		(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	SMALL ENTITY RATE($)	SMALL ENTITY ADDITIONAL FEE($)	OR	OTHER THAN SMALL ENTITY RATE($)	OTHER THAN SMALL ENTITY ADDITIONAL FEE($)
AMENDMENT A	Total (37 CFR 1.16(i))	*	Minus	**	=	x =		OR	x =	
	Independent (37 CFR 1.16(h))	*	Minus	***	=	x =		OR	x =	
	Application Size Fee (37 CFR 1.16(s))									
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE	

		(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	RATE($)	ADDITIONAL FEE($)	OR	RATE($)	ADDITIONAL FEE($)
AMENDMENT B	Total (37 CFR 1.16(i))	*	Minus	**	=	x =		OR	x =	
	Independent (37 CFR 1.16(h))	*	Minus	***	=	x =		OR	x =	
	Application Size Fee (37 CFR 1.16(s))									
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE	

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.

** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".

*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".

The "Highest Number Previously Paid For" (Total or Independent) is the highest found in the appropriate box in column 1.

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APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY.DOCKET.NO	TOT CLAIMS	IND CLAIMS
13/248,028	09/28/2011	2447	870	26WV-160514 [RALEP037]	25	4

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
379 Lytton Avenue
Palo Alto, CA 94301

UPDATED FILING RECEIPT



Date Mailed: 12/27/2011

Receipt is acknowledged of this non-provisional patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please submit a written request for a Filing Receipt Correction. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections**

Applicant(s)

Gregory G. Raleigh, Woodside, CA;
Alireza Raissinia, Monte Sereno, CA;
Jeffrey Green, Sunnyvale, CA;

Power of Attorney: None

Domestic Priority data as claimed by applicant

This application is a CIP of 12/380,757 03/02/2009
and is a CIP of 13/134,005 05/25/2011
and is a CIP of 13/134,028 05/25/2011
and is a CIP of 13/229,580 09/09/2011
and is a CIP of 13/237,827 09/20/2011
and is a CIP of 13/239,321 09/21/2011
and claims benefit of 61/387,243 09/28/2010
and claims benefit of 61/387,247 09/28/2010
and claims benefit of 61/389,547 10/04/2010
and claims benefit of 61/407,358 10/27/2010
and claims benefit of 61/418,507 12/01/2010
and claims benefit of 61/418,509 12/01/2010
and claims benefit of 61/420,727 12/07/2010
and claims benefit of 61/422,565 12/13/2010
and claims benefit of 61/422,572 12/13/2010
and claims benefit of 61/422,574 12/13/2010
and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

Foreign Applications (You may be eligible to benefit from the **Patent Prosecution Highway** program at the USPTO. Please see http://www.uspto.gov for more information.)

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If Required, Foreign Filing License Granted: 10/14/2011

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 13/248,028**

Projected Publication Date: 04/05/2012

Non-Publication Request: No

Early Publication Request: No
**** SMALL ENTITY ****
Title

Enterprise Access Control and Accounting Allocation for Access Networks

Preliminary Class

709

PROTECTING YOUR INVENTION OUTSIDE THE UNITED STATES

Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

Almost every country has its own patent law, and a person desiring a patent in a particular country must make an application for patent in that country in accordance with its particular laws. Since the laws of many countries differ in various respects from the patent law of the United States, applicants are advised to seek guidance from specific foreign countries to ensure that patent rights are not lost prematurely.

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For information on preventing theft of your intellectual property (patents, trademarks and copyrights), you may wish to consult the U.S. Government website, http://www.stopfakes.gov. Part of a Department of Commerce initiative, this website includes self-help "toolkits" giving innovators guidance on how to protect intellectual property in specific countries such as China, Korea and Mexico. For questions regarding patent enforcement issues, applicants may call the U.S. Government hotline at 1-866-999-HALT (1-866-999-4158).

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Title 37, Code of Federal Regulations, 5.11 & 5.15

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh, et al.	Not Yet Assigned
Serial No. 13/248,028	Art Unit: 2447
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Mail Stop Missing Parts
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

RESPONSE TO NOTICE TO FILE MISSING PARTS UNDER 37 C.F.R. 1.53(b)

Dear Sir:

In response to the Notice to File Missing Parts of Application mailed on October 18, 2011, in the above-identified application, enclosed herewith are the missing parts needed to complete filing of the above-identified patent application. The signed declaration for patent application is enclosed herewith under 37 C.F.R. §§1.27 and 1.16(e).

A replacement abstract in clean and marked versions is also enclosed herewith under 37 C.F.R. §§1.72(b) and 1.121.

☒ Small entity status is proper for the assignee under 37 C.F.R. §§1.9 and 1.27.

The fees associated with the filing of this response are shown below:

		Fees
Missing Parts Surcharge (small entity)		$ 65.00
TOTAL FEE ENCLOSED (small entity)	=	**$ 65.00**

☐ No additional fee is required for this _____.
☒ Please charge Deposit Account No. 50-4561 in the amount of $65.00.
☒ The Commissioner is hereby authorized to charge any additional fees and credit any overpayments to Deposit Account No. 50-4561.
☒ Charge any patent application processing fees under 37 C.F.R. 1.17.

Respectfully submitted,

Date: December 19, 2011

By: _____

Marc A. Sockol
Reg. No. 40,823
Customer Number 69849
Sheppard Mullin Richter & Hampton LLP
379 Lytton Avenue
Palo Alto, CA 94301-1432
(650) 815-2600

ABSTRACT OF THE DISCLOSURE

Enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes: monitoring a service usage activity of a wireless communication device, and determining an enterprise and consumer billing allocation for the monitored service usage activity; reporting the monitored service usage activity to a network element, in which the network element determines an enterprise and consumer billing allocation for the monitored service usage activity; or providing a service design center for configuring an enterprise and consumer billing allocation of monitored service usage activities for a plurality of wireless communication devices associated with an enterprise account, and implementing the configured enterprise and consumer billing allocation for monitored service usage activities for the plurality of wireless communication devices associated with the enterprise account.

ABSTRACT OF THE DISCLOSURE

Enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes: monitoring a service usage activity of a wireless communication device, and determining an enterprise and consumer billing allocation for the monitored service usage activity[[.]] ; ~~In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes~~ monitoring a service usage activity of a wireless communication device, and reporting the monitored service usage activity to a network element, in which the network element determines an enterprise and consumer billing allocation for the monitored service usage activity[[.]] ; ~~In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes~~ or providing a service design center for configuring an enterprise and consumer billing allocation of monitored service usage activities for a plurality of wireless communication devices associated with an enterprise account, and implementing the configured enterprise and consumer billing allocation for monitored service usage activities for the plurality of wireless communication devices associated with the enterprise account.

PTO/SB/01 (04-09)
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DECLARATION FOR UTILITY OR DESIGN PATENT APPLICATION (37 CFR 1.63)

☐ Declaration Submitted With Initial Filing OR ☒ Declaration Submitted after Initial Filing (surcharge (37 CFR1.16 (f)) required)

Attorney Docket Number	26WV-160514 [RALEP037]
First Named Inventor	Gregory G. Raleigh, et al.
COMPLETE IF KNOWN	
Application Number	13/248,028
Filing Date	September 28, 2011
Art Unit	Not Yet Assigned
Examiner Name	Not Yet Assigned

I hereby declare that: (1) Each inventor's residence, mailing address, and citizenship are as stated below next to their name; and (2) I believe the inventor(s) named below to be the original and first inventor(s) of the subject matter which is claimed and for which a patent is sought on the invention entitled:

Enterprise Access Control and Accounting Allocation for Access Networks

(Title of the Invention)

the application of which

☐ is attached hereto

OR

☒ was filed on (MM/DD/YYYY) 09/28/2011 as United States Application Number or PCT International Application Number 13/248,028 and was amended on (MM/DD/YYYY) _____ (if applicable).

I hereby state that I have reviewed and understand the contents of the above identified application, including the claims, as amended by any amendment specifically referred to above.

I acknowledge the duty to disclose information which is material to patentability as defined in 37 CFR 1.56, including for continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application.

Authorization To Permit Access To Application by Participating Offices

☒ If checked, the undersigned hereby grants the USPTO authority to provide the European Patent Office (EPO), the Japan Patent Office (JPO), the Korean Intellectual Property Office (KIPO), the World Intellectual Property Office (WIPO), and any other intellectual property offices in which a foreign application claiming priority to the above-identified patent application is filed access to the above-identified patent application. See 37 CFR 1.14(c) and (h). This box should not be checked if the applicant does not wish the EPO, JPO, KIPO, WIPO, or other intellectual property office in which a foreign application claiming priority to the above-identified patent application is filed to have access to the above-identified patent application.

In accordance with 37 CFR 1.14(h)(3), access will be provided to a copy of the above-identified patent application with respect to: 1) the above-identified patent application-as-filed; 2) any foreign application to which the above-identified patent application claims priority under 35 U.S.C. 119(a)-(d) if a copy of the foreign application that satisfies the certified copy requirement of 37 CFR 1.55 has been filed in the above-identified patent application; and 3) any U.S. application-as-filed from which benefit is sought in the above-identified patent application.

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This collection of information is required by 35 U.S.C. 115 and 37 CFR 1.63. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 21 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance completing the form, call 1-800-PTO-9199 and select option 2.

DECLARATION — Utility or Design Patent Application

Claim of Foreign Priority Benefits

I hereby claim foreign priority benefits under 35 U.S.C. 119(a)-(d) or (f), or 365(b) of any foreign application(s) for patent, inventor's or plant breeder's rights certificate(s), or 365(a) of any PCT international application which designated at least one country other than the United States of America, listed below and have also identified below, by checking the box, any foreign application for patent, inventor's or plant breeder's rights certificate(s), or any PCT international application having a filing date before that of the application on which priority is claimed.

Prior Foreign Application Number(s)	Country	Foreign Filing Date (MM/DD/YYYY)	Priority Not Claimed	Certified Copy Attached? YES	NO
			☐	☐	☐
			☐	☐	☐
			☐	☐	☐
			☐	☐	☐

☐ Additional foreign application numbers are listed on a supplemental priority data sheet PTO/SB/02B attached hereto.

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DECLARATION — Utility or Design Patent Application

Direct all correspondence to:	☒ The address associated with Customer Number:	69849	OR ☐	Correspondence address below

Name		
Address		
City	State	Zip
Country	Telephone	Email

WARNING:

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I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under 18 U.S.C. 1001 and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

NAME OF SOLE OR FIRST INVENTOR:		☐ A petition has been filed for this unsigned inventor	
Given Name (first and middle [if any])		Family Name or Surname	
Gregory G.		Raleigh	
Inventor's Signature		Date	
		10-26-2011	
Residence: City	State	Country	Citizenship
Woodside	California	U.S.	U.S.
Mailing Address			
131 Fox Hollow Road			
City	State	Zip	Country
Woodside	California	94062	U.S.

☒ Additional inventors or a legal representative are being named on the 1 supplemental sheet(s) PTO/SB/02A or 02LR attached hereto

PTO/SB/02A (07-07)
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DECLARATION

ADDITIONAL INVENTOR(S)
Supplemental Sheet

Name of Additional Joint Inventor, if any:	☐ A petition has been filed for this unsigned inventor		
Given Name (first and middle (if any))	Family Name or Surname		
Alireza	Raissinia		
Inventor's Signature			Date 11/23/2011
Monte Sereno Residence: City	California State	U.S. Country	U.S. Citizenship
15147 Elm Park Mailing Address			
Monte Sereno City	California State	95030-2120 Zip	U.S. Country
Name of Additional Joint Inventor, if any:	☐ A petition has been filed for this unsigned inventor		
Given Name (first and middle (if any))	Family Name or Surname		
Jeffrey	Green		
Inventor's Signature			Date 12/6/2011
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Name of Additional Joint Inventor, if any:	☐ A petition has been filed for this unsigned inventor		
Given Name (first and middle (if any)	Family Name or Surname		
Inventor's Signature			Date
Residence: City	State	Country	Citizenship
Mailing Address			
City	State	Zip	Country

This collection of information is required by 35 U.S.C. 115 and 37 CFR 1.63. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 21 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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Electronic Patent Application Fee Transmittal

Application Number:	13248028
Filing Date:	28-Sep-2011
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Marc A. Sockol/Linda Brost
Attorney Docket Number:	26WV-160514 [RALEP037]

Filed as Small Entity

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Late filing fee for oath or declaration	2051	1	65	65
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Miscellaneous:				
			Total in USD ($)	**65**

Electronic Acknowledgement Receipt	
EFS ID:	11658890
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Linda Brost
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	19-DEC-2011
Filing Date:	28-SEP-2011
Time Stamp:	22:31:54
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$65
RAM confirmation Number	8691
Deposit Account	504561
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The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: Charge any Additional Fees required under 37 C.F.R. Section 1.17 (Patent application and reexamination processing fees) Charge any Additional Fees required under 37 C.F.R. Section 1.19 (Document supply fees)	

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File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1		160514-RALEP037-MPResponseReplAbstract121911.pdf	256095 6667133ae3466959be1ff53b066fae309093d7b6	yes	9

Multipart Description/PDF files in .zip description

Document Description	Start	End
Transmittal Letter	1	1
Applicant Response to Pre-Exam Formalities Notice	2	3
Abstract	4	4
Abstract	5	5
Oath or Declaration filed	6	9

Warnings:

Information:

2	Fee Worksheet (SB06)	fee-info.pdf	30262 ebd444ba42d87c57f29e8b2c8ba542ff81ab05a7	no	2

Warnings:

Information:

Total Files Size (in bytes):	286357

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If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

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PTO/SB/21 (07-09)
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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission	9

Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447 Conf. No. 8510
Examiner Name	Not Yet Assigned
Attorney Docket Number	26WV-160514 [RALEP037]

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
  - ☐ Fee Attached
- ☐ Preliminary Amendment
  - ☐ After Final
  - ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☐ Information Disclosure Statement with PTO/SB/08a/b
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
- ☒ Reply to Missing Parts under 37 CFR 1.52 or 1.53 (2 pgs.)

- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Atty. to Prosecute Applications [PTO/SB/80]
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
- ☐ Landscape Table on CD

- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☒ Other Enclosure(s) (please Identify below):

  Declaration for Utility Application (4 pgs).; replacement Abstract in clean and marked versions (2 pgs.)

Remarks

You are hereby authorized to charge any additional fee required or credit any overpayment to Deposit Account No. 50-4561.

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Sheppard, Mullin, Richter & Hampton LLP Customer No. 69849		
Signature			
Printed name	Marc A. Sockol		
Date	December 19, 2011	Reg. No.	40,823

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this correspondence is being filed electronically via EFS-Web addressed to the Commissioner for Patents on the date shown below:

Signature	Linda K. Brost		
Typed or printed name	Linda K. Brost	Date	December 19, 2011

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh, et al.	Not Yet Assigned
Serial No. 13/248,028	Art Unit: 2447
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

PRELIMINARY AMENDMENT

Sir:

Prior to examination of the above-referenced application, please enter the following amendments and consider the following remarks:

In the Specification:

Please replace duplicate Paragraphs [0001] through [0003] on Pages 1 through 5 of the specification with the following paragraphs [0001] through [0003]:

-- **[0001]** This application is a continuation-in-part of and incorporates by reference the following U.S. pending non-provisional patent applications: U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No.

12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,769 filed March 2, 2009, entitled "Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," U.S. serial No. 13/134,028 filed May 25, 2011, entitled "Device-Assisted Services for Protecting Network Capacity," U.S. serial No. 13/134,005 filed May 25, 2011, entitled "System and Method for Wireless Network Offloading," U.S. serial No. 13/229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces," U.S. serial No. 13/237,827 filed September 20, 2011, entitled "Adapting Network Policies Based on Device Service Processor Configuration," U.S. serial No. 13/239,321 filed September 21, 2011, entitled " Service Offer Set Publishing to Device Agent with On-Device Service Selection," U.S. serial No. 13/247,998 filed September 28, 2011, entitled "Secure Device Data Records" and U.S. serial No. 13/248,025 filed September 28, 2011, entitled "Service Design Center for Device Assisted Services." This application claims priority to and incorporates by reference the following U.S. pending provisional patent applications: U.S. provisional serial No. 61/387,243 filed September 28, 2010, entitled "Enterprise and Consumer Billing Allocation for Wireless Communication Device Service Usage Activities," U.S. provisional serial No. 61/387,247 filed September 28, 2010, entitled "Secured Device Data Records," U.S. provisional serial No. 61/389,547 filed October 4, 2010, entitled "User Notifications for Device Assisted Services," U.S. provisional serial No. 61/407,358 filed October 27, 2010, entitled "Service Controller and Service Processor Architecture," U.S. provisional serial No. 61/418,507 filed December 1, 2010, entitled "Application Service Provider Interface System," U.S. provisional serial No. 61/418,509 filed

December 1, 2010, entitled "Service Usage Reporting Reconciliation and Fraud Detection for Device Assisted Services," U.S. provisional serial No. 61/420,727 filed December 7, 2010, entitled "Secure Device Data Records," U.S. provisional serial No. 61/422,565 filed December 13, 2010, entitled "Service Design Center for Device Assisted Services," U.S. provisional serial No. 61/422,572 filed December 13, 2010, entitled "System Interfaces and Workflows for Device Assisted Services," U.S. provisional serial No. 61/422,574 filed December 13, 2010, entitled "Security and Fraud Detection for Device Assisted Services," U.S. provisional serial No. 61/435,564 filed January 24, 2011, entitled "Framework for Device Assisted Services," and U.S. provisional serial No. 61/472,606 filed April 6, 2011, entitled "Managing Service User Discovery and Service Launch Object Placement on a Device."

[0002] Further, this application incorporates by reference the following U.S. provisional patent applications: U.S. provisional serial No. 61/206,354 filed January 28, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/206,944 filed February 4, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/207,393 filed February 10, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/207,739 filed February 13, 2009, entitled "Services Policy Communication System and Method," U.S. provisional serial No. 61/270,353 filed July 6, 2009, entitled "Device Assisted CDR Creation, Aggregation, Mediation and Billing," U.S. provisional serial No. 61/275,208 filed August 25, 2009, entitled "Adaptive Ambient Services," U.S. provisional serial No. 61/237,753 filed August 28, 2009, entitled "Adaptive Ambient Services," U.S. provisional serial No. 61/252,151 filed October 15, 2009, entitled "Security Techniques for Device Assisted Services," U.S. provisional serial No. 61/252,153 filed October 15, 2009, entitled "Device Group Partitions and Settlement Platform," U.S. provisional serial No. 61/264,120 filed November 24, 2009, entitled "Device Assisted Services Install," U.S. provisional serial No. 61/264,126 filed November 24, 2009, entitled "Device Assisted Services Activity Map," U.S. provisional serial No. 61/348,022 filed May 25, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional serial No. 61/381,159 filed September 9, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional serial No. 61/381,162 filed September 9, 2010, entitled "Service Controller Interfaces and Workflows," U.S. provisional serial No. 61/384,456 filed

September 20, 2010, entitled "Securing Service Processor with Sponsored SIMs," U.S. provisional serial No. 61/385,020 filed September 21, 2010, entitled "Service Usage Reconciliation System Overview." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S.

serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy" claim priority to U.S. provisional serial No. 61/206,354 filed January 28, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central

Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy" claim priority to U.S. provisional serial No. 61/206,944 filed February 4, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device

Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/207,393 filed February 10, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/380,759 filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. serial No. 12/380,779 filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. serial No. 12/380,758 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with

Reporting, Synchronization, and Notification," U.S. serial No. 12/380,778 filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. serial No. 12/380,768 filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. serial No. 12/380,767 filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. serial No. 12/380,780 filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. serial No. 12/380,755 filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. serial No. 12/380,756 filed March 2, 2009, entitled "Network Based Ambient Services," U.S. serial No. 12/380,770 filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. serial No. 12/380,772 filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. serial No. 12/380,782 filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. serial No. 12/380,783 filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. serial No. 12/380,757 filed March 2, 2009, entitled "Service Activation Tracking System," U.S. serial No. 12/380,781 filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. serial No. 12/380,774 filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. serial No. 12/380,771 filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices" (issued as U.S. Patent No. 8,023,425 on September 20, 2011), U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,773 filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. serial No. 12/380,777 filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. serial

No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/207,739 filed February 13, 2009, entitled "Services Policy Communication System and Method." The following applications, U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/695,980 filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," claim priority to U.S. provisional serial No. 61/270,353 filed July 6, 2009, entitled "Device Assisted CDR Creation, Aggregation, Mediation and Billing." The following application, U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," claims priority to U.S. provisional serial No. 61/275,208 filed August 25, 2009, entitled "Adaptive Ambient Services." The following application, U.S. serial No. 12/695,020 filed January 27, 2010, entitled "Adaptive Ambient Services," claims priority to U.S. provisional serial No. 61/237,753 filed August 28, 2009, entitled "Adaptive Ambient Services." The following applications, U.S. serial No. 12/694,445 filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. serial No. 12/695,021 filed January 27, 2010 entitled "Quality of Service for Device Assisted Services" claim priority to U.S. provisional serial No. 61/252,151 filed October 15, 2009, entitled "Security Techniques for Device Assisted Services." The following applications, U.S. serial No. 12/694,451 filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. serial No. 12/695,021 filed January 27, 2010, entitled "Quality of Service for Device Assisted Services" claim priority to U.S. provisional serial No. 61/252,153 filed October 15, 2009, entitled "Device Group Partitions and Settlement Platform." The following application, U.S. serial No. 12/694,455 filed January 27, 2010, entitled "Device Assisted Services Install" claims priority to U.S. provisional serial No. 61/264,120 filed November 24, 2009, entitled "Device Assisted Services Install." The following application, U.S. serial No. 12/695,019 filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing" claims priority to U.S. provisional serial No. 61/264,126 filed November 24, 2009, entitled "Device Assisted Services Activity Map." The following applications, U.S. serial No. 13/134,028 filed May 25, 2011, entitled "Device-Assisted Services for Protecting Network Capacity" and U.S. serial No. 13/134,005 filed May 25, 2011, entitled

"System and Method for Wireless Network Offloading" claim priority to U.S. provisional serial No. 61/348,022 filed May 25, 2010, entitled "Device Assisted Services for Protecting Network Capacity." The following application, U.S. serial No. 13,229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces" claims priority to U.S. provisional serial No. 61/381,159 filed September 9, 2010, entitled "Device Assisted Services for Protecting Network Capacity." The following application, U.S. serial No. 13,229,580 filed September 9, 2011, entitled "Wireless Network Service Interfaces" claims priority to U.S. provisional serial No. 61/381,162 filed September 9, 2010, entitled "Service Controller Interfaces and Workflows." The following application, U.S. serial No. 13/237,827 filed September 20, 2011, entitled "Adapting Network Policies Based on Device Service Processor Configuration" claims priority to U.S. provisional serial No. 61/384,456 filed September 20, 2010, entitled "Securing Service Processor with Sponsored SIMs." The following application, U.S. serial No. 13/239,321 filed September 21, 2011, entitled "Service Office Set Publishing to Device Agent with On-Device Service Selection" claims priority to U.S. provisional serial No. 61/385,020 filed September 21, 2010, entitled "Service Usage Reconciliation System Overview."

[0003] All of the above patents and applications are hereby incorporated by reference. --

REMARKS

Applicants respectfully request entry of the preliminary amendment set forth in this paper. Duplicate Paragraphs [0001] through [0003] of the specification are being replaced herein.

The undersigned authorizes any fees which may be required, or credit any overpayment to Deposit Account No. 50-4561. Should the Examiner have any questions or need any additional information regarding this communication, the Examiner is invited to contact the undersigned at the telephone number shown below.

Respectfully submitted,

Date: December 14, 2011 By: _____

Marc A. Sockol
Reg. No. 40,823
Customer Number 69849
Sheppard Mullin Richter & Hampton LLP
379 Lytton Avenue
Palo Alto, CA 94301-1432
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CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being filed electronically via EFS-Web addressed to the Commissioner for Patents on:

Date: December 14, 2011 By: Linda K. Brost
Linda K. Brost

Electronic Acknowledgement Receipt

EFS ID:	11622095
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Linda Brost
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	14-DEC-2011
Filing Date:	28-SEP-2011
Time Stamp:	20:40:25
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	no

File Listing:

Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1		160514PrelimAmendNotofChgofEntityStatus121411.pdf	270266 c1545d1d008875f0762975c567578848197d80ca	yes	14

	Multipart Description/PDF files in .zip description		
	Document Description	**Start**	**End**
	Transmittal Letter	1	1
	Miscellaneous Incoming Letter	2	2
	Preliminary Amendment	3	13
	Applicant Arguments/Remarks Made in an Amendment	14	14
Warnings:			
Information:			
	Total Files Size (in bytes):	270266	

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111
If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.

National Stage of an International Application under 35 U.S.C. 371
If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office
If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

PTO/SB/21 (07-09)
Approved for use through 07/31/2012. OMB 0651-0031
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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission	14

Application Number	13/248,028
Filing Date	September 28, 2011
First Named Inventor	Gregory G. Raleigh, et al.
Art Unit	2447 Conf. No. 8510
Examiner Name	Not Yet Assigned
Attorney Docket Number	26WV-160514 [RALEP037]

ENCLOSURES *(Check all that apply)*

- ☐ Fee Transmittal Form
- ☐ Fee Attached
- ☒ Preliminary Amendment (12 pgs.)
- ☐ After Final
- ☐ Affidavits/declaration(s)
- ☐ Extension of Time Request
- ☐ Express Abandonment Request
- ☐ Information Disclosure Statement with PTO/SB/08a/b
- ☐ Certified Copy of Priority Document(s)
- ☐ Reply to Missing Parts/ Incomplete Application
- ☐ Reply to Missing Parts under 37 CFR 1.52 or 1.53
- ☐ Drawing(s)
- ☐ Licensing-related Papers
- ☐ Petition
- ☐ Petition to Convert to a Provisional Application
- ☐ Power of Atty. to Prosecute Applications [PTO/SB/80] (1 pg.)
- ☐ Terminal Disclaimer
- ☐ Request for Refund
- ☐ CD, Number of CD(s) _____
- ☐ Landscape Table on CD
- ☐ After Allowance Communication to TC
- ☐ Appeal Communication to Board of Appeals and Interferences
- ☐ Appeal Communication to TC **(Appeal Notice, Brief, Reply Brief)**
- ☐ Proprietary Information
- ☐ Status Letter
- ☒ Other Enclosure(s) (please Identify below):

  Notice of Change of Entity Status from Large to Small (1 pg.)

Remarks

You are hereby authorized to charge any additional fee required or credit any overpayment to Deposit Account No. 50-4561.

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm Name	Sheppard, Mullin, Richter & Hampton LLP Customer No. 69849		
Signature			
Printed name	Marc A. Sockol		
Date	December 14, 2011	Reg. No.	40,823

CERTIFICATE OF ELECTRONIC TRANSMISSION

I hereby certify that this correspondence is being filed electronically via EFS-Web addressed to the Commissioner for Patents on the date shown below:

Signature	Linda K Brost		
Typed or printed name	Linda K. Brost	Date	December 14, 2011

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:	Examiner:
Gregory G. Raleigh, et al.	Not Yet Assigned
Serial No. 13/248,028	Art Unit: 2447
Filed: September 28, 2011	Conf. No.: 8510

Title: Enterprise Access Control and Accounting Allocation for Access Networks

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

NOTICE OF CHANGE OF ENTITY STATUS FROM LARGE TO SMALL

Dear Sir:

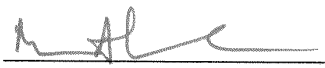
The Applicant herein is now entitled to claim small entity status for the above-referenced patent application, and shall henceforth pay fees due at the small entity rate.

Please change your records to reflect this change in entity status.

No fee should be required for this change of entity status, but if such fee is determined to be owed, please charge Deposit Account No. 50-4561 for the same.

Respectfully submitted,

Date: December 14, 2011

By: 

Marc A. Sockol
Reg. No. 40,823
Customer Number 69849
Sheppard Mullin Richter & Hampton LLP
379 Lytton Avenue
Palo Alto, CA 94301-1432

W02-WEST:1LKB1\404263046.1

PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number: 13/248,028

APPLICATION AS FILED - PART I

FOR	(Column 1) NUMBER FILED	(Column 2) NUMBER EXTRA	SMALL ENTITY RATE($)	SMALL ENTITY FEE($)	OR	OTHER THAN SMALL ENTITY RATE($)	OTHER THAN SMALL ENTITY FEE($)
BASIC FEE (37 CFR 1.16(a), (b), or (c))	N/A	N/A	N/A	95		N/A	
SEARCH FEE (37 CFR 1.16(k), (i), or (m))	N/A	N/A	N/A	310		N/A	
EXAMINATION FEE (37 CFR 1.16(o), (p), or (q))	N/A	N/A	N/A	125		N/A	
TOTAL CLAIMS (37 CFR 1.16(i))	25 minus 20 =	* 5	x 30 =	150	OR		
INDEPENDENT CLAIMS (37 CFR 1.16(h))	4 minus 3 =	* 1	x 125 =	125			
APPLICATION SIZE FEE (37 CFR 1.16(s))	If the specification and drawings exceed 100 sheets of paper, the application size fee due is $310 ($155 for small entity) for each additional 50 sheets or fraction thereof. See 35 U.S.C. 41(a)(1)(G) and 37 CFR 1.16(s).			0.00			
MULTIPLE DEPENDENT CLAIM PRESENT (37 CFR 1.16(j))				0.00			
* If the difference in column 1 is less than zero, enter "0" in column 2.			TOTAL	805		TOTAL	

APPLICATION AS AMENDED - PART II

		(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	SMALL ENTITY RATE($)	SMALL ENTITY ADDITIONAL FEE($)	OR	OTHER THAN SMALL ENTITY RATE($)	OTHER THAN SMALL ENTITY ADDITIONAL FEE($)
AMENDMENT A	Total (37 CFR 1.16(i))	*	Minus	**	=	x =		OR	x =	
	Independent (37 CFR 1.16(h))	*	Minus	***	=	x =		OR	x =	
	Application Size Fee (37 CFR 1.16(s))									
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE	

		(Column 1) CLAIMS REMAINING AFTER AMENDMENT		(Column 2) HIGHEST NUMBER PREVIOUSLY PAID FOR	(Column 3) PRESENT EXTRA	RATE($)	ADDITIONAL FEE($)	OR	RATE($)	ADDITIONAL FEE($)
AMENDMENT B	Total (37 CFR 1.16(i))	*	Minus	**	=	x =		OR	x =	
	Independent (37 CFR 1.16(h))	*	Minus	***	=	x =		OR	x =	
	Application Size Fee (37 CFR 1.16(s))									
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))							OR		
						TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE	

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.

** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".

*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".

The "Highest Number Previously Paid For" (Total or Independent) is the highest found in the appropriate box in column 1.

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United States Patent and Trademark Office
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www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
13/248,028	09/28/2011	Gregory G. Raleigh	26WV-160514 [RALEP037]

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
390 Lytton Avenue
Palo Alto, CA 94301

FORMALITIES LETTER

OC000000050415796

Date Mailed: 10/18/2011

NOTICE TO FILE MISSING PARTS OF NONPROVISIONAL APPLICATION

FILED UNDER 37 CFR 1.53(b)

Filing Date Granted

Items Required To Avoid Abandonment:

An application number and filing date have been accorded to this application. The item(s) indicated below, however, are missing. Applicant is given **TWO MONTHS** from the date of this Notice within which to file all required items below to avoid abandonment. Extensions of time may be obtained by filing a petition accompanied by the extension fee under the provisions of 37 CFR 1.136(a).

- The oath or declaration is missing.
  A properly signed oath or declaration in compliance with 37 CFR 1.63, identifying the application by the above Application Number and Filing Date, is required.
  Note: If a petition under 37 CFR 1.47 is being filed, an oath or declaration in compliance with 37 CFR 1.63 signed by all available joint inventors, or if no inventor is available by a party with sufficient proprietary interest, is required.

The application is informal since it does not comply with the regulations for the reason(s) indicated below.

The required item(s) identified below must be timely submitted to avoid abandonment:

- A replacement abstract not exceeding 150 words in length and commencing on a separate sheet in compliance with 37 CFR 1.72(b) and 37 CFR 1.121 is required.

Applicant is cautioned that correction of the above items may cause the specification and drawings page count to exceed 100 pages. If the specification and drawings exceed 100 pages, applicant will need to submit the required application size fee.

The applicant needs to satisfy supplemental fees problems indicated below.

The required item(s) identified below must be timely submitted to avoid abandonment:

- A surcharge (for late submission of filing fee, search fee, examination fee or oath or declaration) as set forth in 37 CFR 1.16(f) of $**65** for a small entity in compliance with 37 CFR 1.27, must be submitted.

SUMMARY OF FEES DUE:

Total fee(s) required within **TWO MONTHS** from the date of this Notice is $**65** for a small entity
- $**65** Surcharge.

Replies should be mailed to:

Mail Stop Missing Parts
Commissioner for Patents
P.O. Box 1450
Alexandria VA 22313-1450

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If you are not using EFS-Web to submit your reply, you must include a copy of this notice.

/ttu/

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
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Alexandria, Virginia 22313-1450
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APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY.DOCKET.NO	TOT CLAIMS	IND CLAIMS
13/248,028	09/28/2011	2447	805	26WV-160514 [RALEP037]	25	4

CONFIRMATION NO. 8510

69849
SHEPPARD, MULLIN, RICHTER & HAMPTON LLP
390 Lytton Avenue
Palo Alto, CA 94301

FILING RECEIPT

OC000000050415795

Date Mailed: 10/18/2011

Receipt is acknowledged of this non-provisional patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please submit a written request for a Filing Receipt Correction. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections**

Applicant(s)

Gregory G. Raleigh, Residence Not Provided;
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Power of Attorney: None

Domestic Priority data as claimed by applicant

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and claims benefit of 61/435,564 01/24/2011
and claims benefit of 61/472,606 04/06/2011

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If Required, Foreign Filing License Granted: 10/14/2011

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 13/248,028**

Projected Publication Date: To Be Determined - pending completion of Missing Parts

Non-Publication Request: No

Early Publication Request: No
**** SMALL ENTITY ****
Title

Enterprise Access Control and Accounting Allocation for Access Networks

Preliminary Class

709

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PTO/SB/05 (08-08)
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UTILITY PATENT APPLICATION TRANSMITTAL

(Only for new nonprovisional applications under 37 CFR 1.53(b))

Attorney Docket No.	26WV-160514 [RALEP037]
First Inventor	Gregory G. Raleigh, et al.
Title	Enterprise Access Control and Accounting Allocation for Access Networks
Express Mail Label No.	N/A – EFS Filing

APPLICATION ELEMENTS

See *MPEP chapter 600 concerning utility patent application contents.*

1. ☐ **Fee Transmittal Form** (e.g., PTO/SB/17)
2. ☒ **Applicant claims small entity status.** See 37 CFR 1.27.
3. ☒ **Specification** [*Total Pages* 84] Both the claims and abstract must start on a new page *(For information on the preferred arrangement, see MPEP 608.01(a))*
4. ☒ **Drawing(s)** (35 U.S. C. *113*) [*Total Sheets* 28]
5. **Oath or Declaration** [*Total Sheets* ____]
   a. ☐ Newly executed (original or copy)
   b. ☐ A copy from a prior application (37 CFR 1.63(d)) *(for continuation/divisional with Box 18 completed)*
      i. ☐ DELETION OF INVENTOR(s) Signed statement attached deleting inventor(s) name in the prior application, see 37 CFR 1.63(d)(2) and 1.33(b).
6. ☐ **Application Data Sheet.** See 37 CFR 1.76
7. ☐ **CD-ROM or CD-R** in duplicate, large table or Computer Program *(Appendix)*
   ☐ Landscape Table on CD
8. **Nucleotide and/or Amino Acid Sequence Submission** *(if applicable, items a. - c. are required)*
   a. ☐ Computer Readable Form (CRF)
   b. Specification Sequence Listing on:
      i. ☐ CD-ROM or CD-R (2 copies); or
      ii. ☐ Paper
   c. ☐ Statements verifying identity of above copies

ADDRESS TO: **Commissioner for Patents, P.O. Box 1450, Alexandria VA 22313-1450**

ACCOMPANYING APPLICATION PARTS

9. ☐ **Assignment Papers** (cover sheet & document(s))
   Name of Assignee _____
10. ☐ **37 CFR 3.73(b) Statement** *(when there is an assignee)* ☐ **Power of Attorney**
11. ☐ **English Translation Document** *(if applicable)*
12. ☐ **Information Disclosure Statement** (PTO/SB/08 or PTO-1449)
    ☐ Copies of citations attached
13. ☐ **Preliminary Amendment**
14. ☐ **Return Receipt Postcard** (MPEP 503) *(Should be specifically itemized)*
15. ☐ **Certified Copy of Priority Document(s)** *(if foreign priority is claimed)*
16. ☐ **Nonpublication Request** under 35 U.S.C. 122(b)(2)(B)(i). Applicant must attach form PTO/SB/35 or equivalent.
17. ☒ Other: General Authorization to Petition for Extensions of Time (1 pg.)

18. If a CONTINUING APPLICATION, *check appropriate box, and supply the requisite information below and in the first sentence of the specification following the title, or in an Application Data Sheet under 37 CFR 1.76:*

☐ Continuation ☐ Divisional ☒ Continuation-in-part (CIP) of prior application No.: *See application*

Prior application information: Examiner _____ Art Unit: _____

19. CORRESPONDENCE ADDRESS

☒ The address associated with Customer Number 69849 ***OR*** ☐ Correspondence address below

Name					
Address					
City		State		Zip Code	
Country		Telephone		Email	

Signature		Date	September 28, 2011
Name (Print/Type)	Marc A. Sockol	Registration No. (Attorney/Agent)	40,823

This collection of information is required by 37 CFR 1.53(b). The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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Attorney Docket No.: 26WV-160514 [RALEP037]

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In Re Application of: Examiner: Not Yet Assigned

Gregory G. Raleigh, et al. Art Unit: Not Yet Assigned

Serial No: Not Yet Assigned

Filed: Herewith

For: Enterprise Access Control and Accounting Allocation for Access Networks

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Commissioner of Patents
P.O. Box 1450
Alexandria, VA 22313-1450

GENERAL AUTHORIZATION TO PETITION FOR EXTENSIONS OF TIME

Dear Sir:

With reference to the subject application, and pursuant to 37 C.F.R. § 1.136, Applicants hereby authorize and request the Commissioner to treat any correspondence requiring a petition for extension of time as containing such a request therefor for the appropriate length of time. This general authorization is effective during the pendency of this application, including any divisional or continuing application therefrom.

Where no check is received by the Commissioner, you are hereby authorized to charge payment of the requisite petition fees, or charge any additional fee required under 37 C.F.R. § 1.17, or credit any overpayment of same, to Deposit Account No. **50-4561.**

Respectfully submitted,

Date: September 28, 2011 By: _____

Marc A. Sockol
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CONTINUATION-IN-PART APPLICATION FOR
UNITED STATES PATENT
IN THE NAME

of

- Gregory G. Raleigh -

- Alireza Raissinia -

- Jeffrey Green -

For

- Enterprise Access Control and Accounting Allocation for Access Networks -

DOCKET NO. 26WV-160514 [RALEP037]

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ENTERPRISE ACCESS CONTROL AND ACCOUNTING ALLOCATION FOR ACCESS NETWORKS

CROSS REFERENCE TO OTHER APPLICATIONS

[0001] This application is a continuation-in-part of and incorporates by reference the following U.S. pending nonprovisional patent applications: U.S. publication No. 2010/0188975, filed March 2, 2009, entitled "Verifiable Device Assisted Service Policy Implementation," U.S. publication No. 2010/0192170, filed March 2, 2009, entitled "Device Assisted Service Profile Management with User Preference, Adaptive Policy, Network Neutrality, and User Privacy," U.S. publication No. 2010/0191612, filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Monitoring with Reporting, Synchronization, and Notification," U.S. publication No. 2010/0191576, filed March 2, 2009, entitled "Verifiable Device Assisted Service Usage Billing with Integrated Accounting, Mediation Accounting, and Multi-Account," U.S. publication No. 2010/0188991, filed March 2, 2009, entitled "Network Based Service Policy Implementation with Network Neutrality and User Privacy," U.S. publication No. 2010/0188990, filed March 2, 2009, entitled "Network Based Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy," U.S. publication No. 2010/0192212, filed March 2, 2009, entitled "Automated Device Provisioning and Activation," U.S. publication No. 2010/0191604, filed March 2, 2009, entitled "Device Assisted Ambient Services," U.S. publication No. 2010/0191575, filed March 2, 2009, entitled "Network Based Ambient Services," U.S. publication No. 2010/0188993, filed March 2, 2009, entitled "Network Tools for Analysis, Design, Testing, and Production of Services," U.S. publication No. 2010/0190470, filed March 2, 2009, entitled "Roaming Services Network and Overlay Networks," U.S. publication No. 2010/0192120, filed March 2, 2009, entitled "Open Development System for Access Service Providers," U.S. publication No. 2010/0192207, filed March 2, 2009, entitled "Virtual Service Provider Systems," U.S. application serial No. 12/380,757, filed March 2, 2009, and entitled "Service Activation Tracking System," U.S. publication No. 2010/0191613, filed March 2, 2009, entitled "Open Transaction Central Billing System," U.S. publication No. 2010/0188995, filed March 2, 2009, entitled "Verifiable and Accurate Service Usage Monitoring for Intermediate Networking Devices," U.S. publication No.

2010/0188994, filed March 2, 2009, entitled "Verifiable Service Billing for Intermediate Networking Devices," U.S. publication No. 2010/0191846, filed March 2, 2009, entitled "Verifiable Service Policy Implementation for Intermediate Networking Devices," U.S. publication No. 2010/0188992, filed March 2, 2009, entitled "Service Profile Management with User Preference, Adaptive Policy, Network Neutrality and User Privacy for Intermediate Networking Devices," U.S. publication No. 2010/0191847, filed March 2, 2009, entitled "Simplified Service Network Architecture," U.S. publication No. 2010/0197266, filed January 27, 2010, entitled "Device Assisted CDR Creation, Aggregation, Mediation, and Billing," U.S. publication No. 2010/0198698, filed January 27, 2010, entitled "Adaptive Ambient Services," U.S. publication No. 2010/0199325, filed January 27, 2010, entitled "Security Techniques for Device Assisted Services," U.S. publication No. 2010/0197267, filed January 27, 2010, entitled "Device Group Partitions and Settlement Platform," U.S. publication No. 2010/0198939, filed January 27, 2010, entitled "Device Assisted Services Install," U.S. publication No. 2010/0195503, filed January 27, 2010, entitled "Quality of Service for Device Assisted Services," U.S. publication No. 2010/0197268, filed January 28, 2010, entitled "Enhanced Roaming Services and Converged Carrier Networks with Device Assisted Services and a Proxy," and U.S. application serial No. 13/134,005, filed May 25, 2011, and entitled "System and Method for Wireless Network Offloading," U.S. application serial No. 13/134,028, filed May 25, 2011, and entitled "Device-Assisted Services for Protecting Network Capacity," and U.S. application serial No. 13/229,580, filed September 9, 2011, and entitled "Wireless Network Service Interfaces," U.S. application serial No. 13/237,827, filed September 20, 2011, and entitled "Adapting Network Policies Based on Device Service Processor Configuration," U.S. application serial No. 13/239,321, filed September 21, 2011, and entitled "Service Offer Set Publishing to Device Agent with On-Device Service Selection."

[0001] This application claims priority to and incorporates by reference the following U.S. pending provisional patent applications: U.S. provisional application serial No. 61/387,243, filed September 28, 2010, entitled "Enterprise and Consumer Billing Allocation for Wireless Communication Device Service Usage Activities," U.S. provisional application serial No. 61/387,247, filed September 28, 2010, entitled "Secured Device Data Records," U.S. provisional application serial No. 61/389,547, filed October 4, 2010, entitled "User Notifications for Device Assisted Services," U.S. provisional application serial No. 61/407,358, filed October 27, 2010,

entitled "Service Controller and Service Processor Architecture," U.S. provisional application serial No. 61/418,507, filed December 1, 2010, entitled "Application Service Provider Interface System," U.S. provisional application serial No. 61/418,509, filed December 1, 2010, entitled "Service Usage Reporting Reconciliation and Fraud Detection for Device Assisted Services," U.S. provisional application serial No. 61/420,727, filed December 7, 2010, entitled "Secure Device Data Records," U.S. provisional application serial No. 61/422,565, filed December 13, 2010, entitled "Service Design Center for Device Assisted Services," U.S. provisional application serial No. 61/422,572, filed December 13, 2010, entitled "System Interfaces and Workflows for Device Assisted Services," U.S. provisional application serial No. 61/422,574, filed December 13, 2010, entitled "Security and Fraud Detection for Device Assisted Services," U.S. provisional application serial No. 61/435,564, filed January 24, 2011, entitled "Framework for Device Assisted Services," and U.S. provisional application serial No. 61/472,606, filed April 6, 2011, entitled "Managing Service User Discovery and Service Launch Object Placement on a Device."

[0002] Further, this application incorporates by reference the following U.S. provisional patent applications: U.S. provisional application serial No. 61/206,354, filed January 28, 2009, entitled "Services Policy Communication System and Method," U.S. provisional application serial No. 61/206,944, filed February 4, 2009, entitled "Services Policy Communication System and Method," U.S. provisional application serial No. 61/207,393, filed February 10, 2009, entitled "Services Policy Communication System and Method," U.S. provisional application serial No. 61/207,739, filed February 13, 2009, entitled "Services Policy Communication System and Method," U.S. provisional application serial No. 61/270,353, filed July 6, 2009, entitled "Device Assisted CDR Creation, Aggregation, Mediation and Billing," U.S. provisional application serial No. 61/275,208, filed August 25, 2009, entitled "Adaptive Ambient Services," U.S. provisional application serial No. 61/237,753, filed August 28, 2009, entitled "Adaptive Ambient Services," U.S. provisional application serial No. 61/252,151, filed October 15, 2009, entitled "Security Techniques for Device Assisted Services," U.S. provisional application serial No. 61/252,153, filed October 15, 2009, entitled "Device Group Partitions and Settlement Platform," U.S. provisional application serial No. 61/264,120, filed November 24, 2009, entitled "Device Assisted Services Install," U.S. provisional application serial No. 61/264,126, filed November 24, 2009, entitled "Device Assisted Services Activity Map," U.S. provisional application serial

No. 61/348,022, filed May 25, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional application serial No. 61/381,159, filed September 9, 2010, entitled "Device Assisted Services for Protecting Network Capacity," U.S. provisional application serial No. 61/381,162, filed September 9, 2010, entitled "Service Controller Interfaces and Workflows," U.S. provisional application serial No. 61/384,456, filed September 20, 2010, entitled "Securing Service Processor with Sponsored SIMs," and U.S. provisional application serial No. 61/385,020, filed September 21, 2010, entitled "Service Usage Reconciliation System Overview."

[0003] This application incorporates by reference the following U.S. nonprovisional patent applications, being filed concurrently herewith: U.S. application serial No. 13/247,998, filed September 28, 2011, and entitled "Secure Device Data Records" (Attorney Docket No. 26WV-160515 [RALEP038]); and U.S. application serial No. _____, filed September 28, 2011, by inventors Gregory G. Raleigh, Alireza Raissinia, James Lavine, Justin James, and Jeffrey Green, and entitled "Service Design Center for Device Assisted Services" (Attorney Docket No. 26WV-160520 [RALEP043]).

BACKGROUND

[0004] With the advent of mass market digital communications and content distribution, many access networks such as wireless networks, cable networks and DSL (Digital Subscriber Line) networks are pressed for user capacity, with, for example, EVDO (Evolution-Data Optimized), HSPA (High Speed Packet Access), LTE (Long Term Evolution), WiMax (Worldwide Interoperability for Microwave Access), and Wi-Fi (Wireless Fidelity) wireless networks increasingly becoming user capacity constrained. Although wireless network capacity will increase with new higher capacity wireless radio access technologies, such as MIMO (Multiple-Input Multiple-Output), and with more frequency spectrum being deployed in the future, these capacity gains are likely to be less than what is required to meet growing digital networking demand.

[0005] Similarly, although wire line access networks, such as cable and DSL, can have higher average capacity per user, wire line user service consumption habits are trending toward very high bandwidth applications that can quickly consume the available capacity and degrade overall

network service experience. Because some components of service provider costs go up with increasing bandwidth, this trend will also negatively impact service provider profits.

BRIEF DESCRIPTION OF THE DRAWINGS

[0006] Various embodiments of the invention are disclosed in the following detailed description and the accompanying drawings.

[0007] **Figure 1** illustrates a functional diagram of a network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0008] **Figure 2** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0009] **Figure 3** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0010] **Figure 4** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0011] **Figure 5** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0012] **Figure 6** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0013] **Figure 7** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0014] **Figure 8** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0015] **Figure 9** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0016] **Figure 10** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0017] **Figure 11** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0018] **Figure 12** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0019] **Figure 13** illustrates a functional diagram of a secure device application architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0020] **Figure 14** illustrates a functional diagram of another secure device virtual machine architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0021] **Figure 15** illustrates a functional diagram of another secure device hardware execution partition architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0022] **Figure 16** illustrates a functional diagram of another secure device service processor architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0023] **Figure 17** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0024] **Figure 18** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0025] **Figure 19** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0026] **Figure 20** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0027] **Figure 21** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0028] **Figure 22** illustrates a functional diagram of another network architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0029] **Figure 23** illustrates a functional diagram of a secure device application architecture with device based service usage monitoring for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0030] **Figure 24** illustrates a functional diagram of a secure device virtual machine architecture with device based service usage monitoring for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0031] **Figure 25** illustrates a functional diagram of a secure device hardware execution partition architecture with device based service usage monitoring for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0032] **Figure 26** illustrates a functional diagram of a secure device service processor architecture with device based service usage monitoring for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0033] **Figure 27** illustrates a flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0034] **Figure 28** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0035] **Figure 29** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

[0036] **Figure 30** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments.

DETAILED DESCRIPTION

[0037] The invention can be implemented in numerous ways, including as a process; an apparatus; a system; a composition of matter; a computer program product embodied on a computer readable storage medium; and/or a processor, such as a processor configured to execute instructions stored on and/or provided by a memory coupled to the processor. In this specification, these implementations, or any other form that the invention may take, may be referred to as techniques. In general, the order of the steps of disclosed processes may be altered within the scope of the invention. Unless stated otherwise, a component such as a processor or a memory described as being configured to perform a task may be implemented as a general component that is temporarily configured to perform the task at a given time or a specific component that is manufactured to perform the task. As used herein, the term 'processor' refers to one or more devices, circuits, and/or processing cores configured to process data, such as computer program instructions.

[0038] A detailed description of one or more embodiments of the invention is provided below along with accompanying figures that illustrate the principles of the invention. The invention is described in connection with such embodiments, but the invention is not limited to any embodiment. The scope of the invention is limited only by the claims and the invention encompasses numerous alternatives, modifications and equivalents. Numerous specific details are set forth in the following description in order to provide a thorough understanding of the invention. These details are provided for the purpose of example and the invention may be practiced according to the claims without some or all of these specific details. For the purpose of clarity, technical material that is known in the technical fields related to the invention has not been described in detail so that the invention is not unnecessarily obscured.

[0039] Some enterprises only allow certain specialized wireless devices to be used for connection to their enterprise network. Such devices typically contain secure data storage and enterprise program execution environments to protect enterprise information and network access. This approach is generally directed towards maintaining enterprise data integrity and enterprise network security. However, this approach does not address the various problems associated with

allocating service usage or billing between consumer or non-enterprise service usage activities and enterprise service usage activities.

[0040] Accordingly, there is a need to provide for an enterprise and consumer billing allocation for wireless communication device service usage activities. There is also a need to address various issues with enterprise policies that can vary from employee to employee. For example, roaming policies can be configured differently for a global sales person than for a finance administrator who does not travel as much on enterprise business. Furthermore, some enterprises may not elect to pay for employee wireless communication device purchase or all employee wireless communication service usage needs or desires. As a result, some enterprises would benefit from techniques that allowed such enterprises to piggy back on consumer device or service purchases while maintaining an enterprise and consumer billing allocation for wireless communication device service usage activities.

[0041] Also, some consumers prefer to select their own wireless communication device that may not be an enterprise approved wireless communication device or a specialized enterprise device specified by enterprise IT managers. For example, certain enterprises may only offer certain Blackberry smart phone devices, and certain employees may prefer Apple iPhone and/or various Android based smart phone devices. Another trend suggests that a growing number of enterprise employees desire to use a single wireless communication device for their enterprise mobile communication, enterprise information access, and enterprise network access as well as for, for example, their personal mobile communication, access, and application needs (e.g., consumer/personal, that is, non-enterprise, use of cellular calls, text messaging, web browsing, social networking, games, and various other service usage activities). Such dual persona devices, where a first persona is oriented to enterprise access and/or application needs and a second persona is oriented to personal access and/or application needs, are enabled by the disclosure herein.

[0042] As a result, enterprise network managers generally need a way to safely allow consumers to perform consumer mobile access services that the enterprise can specify that will not be paid for by the enterprise. Various network architectures and techniques are described herein that allow an enterprise to determine how much service usage (e.g., how much of a

corresponding service bill) should be allocated to device user services or consumer services and how much should be allocated to enterprise services in which the enterprise sponsors the enterprise access. Various design approaches and techniques are described herein for allocating enterprise and consumer billing in a secure manner that works with both specialized enterprise wireless communication devices as well as other wireless communication devices. For example, crediting a user bill with sponsored enterprise service usage is provided using various techniques described herein. As another example, providing enterprise employee reimbursement for enterprise services used on the employee wireless communication device or allowing an enterprise to deduct employee consumer service usage from their paycheck is provided using various techniques described herein. As yet another example, allowing a consumer to select from an instant activation platform on a wireless communication device that comes pre-loaded with various enterprise services is provided using various techniques described herein. As yet a further example, providing for a capability to install or download an enterprise application that provides secure enterprise mobile services access and allocating enterprise and consumer billing for consumer wireless communication devices is provided using various techniques described herein.

[0043] Various techniques for monitoring service usage and providing for secured and verifiable device assisted services (DAS), including DAS based service usage monitoring, are disclosed in co-pending U.S. Patent Application No. 12/380,758 (Attorney Docket No. RALEP003), entitled VERIFIABLE DEVICE ASSISTED SERVICE USAGE MONITORING WITH REPORTING, SYNCHRONIZATION, AND NOTIFICATION, filed on March 2, 2009, published as U.S. Pub. App. No. 20100191612, co-pending U.S. Patent Application No. 12/695,019 (Attorney Docket No. RALEP022), entitled DEVICE ASSISTED CDR CREATION, AGGREGATION, MEDIATION and BILLING, filed on January 27, 2010, published as U.S. Pub. App. No. 20100197266, co-pending U.S. Patent Application No. 12/695,020 (Attorney Docket No. RALEP024), entitled ADAPTIVE AMBIENT SERVICES, filed on January 27, 2010, published as U.S. Pub. App. No. 20100198698, co-pending U.S. Patent Application No. 12/694,445 (Attorney Docket No. RALEP025), entitled SECURITY TECHNIQUES FOR DEVICE ASSISTED SERVICES, filed on January 27, 2010, published as U.S. Pub. App. No. 20100199325, co-pending U.S. Patent Application No. 12/694,451 (Attorney Docket No. RALEP026), entitled DEVICE GROUP PARITIONS AND SETTLEMENT PLATFORM, filed

on January 27, 2010, published as U.S. Pub. App. No. 20100197267, which are incorporated herein by reference for all purposes.

[0044] In some embodiments, allocating enterprise and consumer billing for service usage activities on a wireless communication device is provided for service usage activities that an enterprise configures as approved and/or sponsored for enterprise billing (e.g., such service usage activities are paid for at least in part by the enterprise) and consumer applications and service usage activities that the device user chooses to use from the wireless communication device and that the enterprise does not sponsor. Various embodiments are disclosed herein describing a wide range of devices that users and enterprises may desire to use for such dual-purpose application scenarios. In some embodiments, devices for such applications can include a less specialized and secure device program execution environment as further described herein.

[0045] Accordingly, enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device (e.g., the monitoring can be performed in the wireless communication device and/or the monitoring of enterprise application service usage can be performed using a secure application server in the enterprise network), and determining an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments the allocation is determined by classifying the service usage activities as associated with a consumer service usage activity (e.g., in a consumer service usage activity list) or associated with an enterprise service usage activity (e.g., in an enterprise service usage activity list; or, as another example, if the monitored service usage activity is not included in the enterprise service usage activity list, then it can be automatically classified as a consumer service usage activity by default).

[0046] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes providing a service design center (SDC) for configuring an enterprise and consumer billing allocation of monitored service usage activities for a plurality of wireless communication devices associated with an enterprise account, and implementing the configured enterprise and consumer billing allocation for

monitored service usage activities for the plurality of wireless communication devices associated with the enterprise account.

[0047] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring service usage of a wireless communication device, and determining whether a user is acting as a consumer (e.g., personal service usage activities on the wireless communication device) or a professional (e.g., enterprise service usage activities on the wireless communication device, that is, the user is working on the wireless communication device in his or her capacity as an employee for an enterprise, in which the wireless communication device is associated with an enterprise account for the enterprise) based on the monitored service usage activity (e.g., based on place, time of day, application or service activity, and/or other criteria or factors). In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities differentially charges and/or allocates billing between the enterprise and the consumer based on a classification of the monitored service usage activity as allocated to the enterprise or to the consumer for billing/charging purposes. Such embodiments enable a dual persona device user experience.

[0048] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device, and reporting the monitored service usage activity to a network element (e.g., a service controller, a service usage reconciliation function, another service control or billing/charging function in the network, or another network element), in which the network element determines an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments, the network element (e.g., a service controller, a service usage reconciliation function, another service control or billing/charging function in the network, or another network element) determines an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments, a service usage reconciliation function determines how much service usage is due to enterprise service usage activities and how much is due to consumer service usage activities. In some embodiments, after determining the allocation between consumer and enterprise service usage activities, the service usage reconciliation function provides the information to a service usage accounting function (e.g., a carrier billing

server or an enterprise service usage accounting server), which in turn delivers a consumer usage report or bill and/or an enterprise usage report or bill. In some embodiments, the service usage reconciliation function determines the amount of enterprise service usage and creates a service usage credit record so that a device user's account can be credited or a device user can be compensated or reimbursed for enterprise service usage costs. In some embodiments, a service usage monitor is configured to monitor service usage activities of a device. In some embodiments, the service usage monitor is configured to classify the monitored service usage activities as enterprise service usage activities. In some embodiments, the service usage monitor is configured to classify the monitored service usage activities as consumer service usage activities. In some embodiments, the service usage monitor is configured to monitor a first group of service usage activities for service usage allocation to a device user (e.g., using a list of service usage activities associated with a consumer service usage), and a second group of service usage activities for service usage allocation to an enterprise (e.g., using a list of service usage activities associated with an enterprise service usage). In some embodiments, service usage activities (e.g., service activities, such as applications, network, and/or voice based activities that use wireless network service usage resources) are classified using various techniques described herein, such as based on application (e.g., application credential), device (e.g., device credential), time of day, network destination, network traffic protocol and/or port, and various other criteria/factors. In some embodiments, the service usage monitor is implemented in the network (e.g., on one or more network elements in the carrier network and/or enterprise network, as described herein). In some embodiments, the service usage monitor is implemented in the device (e.g., using various techniques described herein, including verifiable and/or secured device-based implementations). In some embodiments, the service usage monitor is implemented using both network-based and device-based techniques, as described herein with respect to various embodiments.

[0049] In some embodiments, a set of service activities that will be sponsored by an enterprise (e.g., a specified or configured list of enterprise sponsored service activities) is managed by an enterprise service design center. In some embodiments, a list of service activities and the associated service policies for each service activity are compiled to form an enterprise sponsored service activity policy set. For example, enterprise email, enterprise calendar, and enterprise contacts can be configured as sponsored service activities. In some embodiments, the sponsored

enterprise services list includes a list of network destinations that are associated with the services (e.g., an enterprise mail server address and/or an enterprise internal corporate network). For example, the enterprise email can be a sponsored service that is associated with an enterprise sponsored email service policy, which can limit destinations for corporate email, sizes of emails and/or email attachments, and/or other email related usage criteria or factors (e.g., a service usage charging policy).

[0050] In some embodiments, the monitored service usage is reported to the reconciliation function by a carrier network service usage monitoring element (e.g., a home agent (HA), access network gateway, or other network element, such as a deep packet inspection (DPI) function). In some embodiments, the monitored service usage is reported to the reconciliation function by an enterprise network service usage monitoring element (e.g., a carrier network gateway or a mobile services gateway/server or other element in the enterprise network that can measure service usage and associate it with a given device credential or application credential). In some embodiments, the monitored service usage is reported to the reconciliation function by an element in the mobile device (e.g., a service usage monitor in a secure enterprise mobile services application or a Service Processor function, which can be securely implemented and/or verified using various techniques described herein).

[0051] In some embodiments, a service design center for implementing enterprise and consumer billing allocation for wireless communication device service usage activities is provided. For example, an enterprise manager can use the service design center to select one or more services that the enterprise agrees to pay for/is responsible for paying for and to select one or more other services that the employees of the enterprise must agree to pay for/are responsible for paying for (e.g., if the employee elects to use/have such services that are not charged to the enterprise, or included as enterprise services that are charged to or paid for by the enterprise).

[0052] In some embodiments, a service design center that facilitates configuration of sponsored enterprise services for implementing enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, a service design center for implementing enterprise and consumer billing allocation for wireless communication device service usage activities includes providing a service design center for a

carrier network and another service design center for an enterprise network (e.g., in some cases, these service design centers can be combined).

[0053] In some embodiments, an enterprise sponsored service activity policy set is created by an enterprise network administrator through an enterprise service design center user interface (UI). In some embodiments, the enterprise sponsored service activity policy set includes a list of network destination addresses that corresponds to the desired sponsored service activity list, along with an access policy or service usage charging policy for the service activities. In some embodiments, all service activities in the enterprise sponsored service activity policy set receive the same access policies or charging policies. In some embodiments, a first subset of one or more of the service activities in the enterprise sponsored service activity policy set receive access policies or charging policies that are different than that of a second subset of service activities. For example, a sponsored enterprise email service can be in the first subset, and sponsored mobile voice services can be in the second subset, as certain employees (e.g., traveling sales personnel and/or executives) can be granted international and/or roaming mobile voice services, and other employees can be granted more limited sponsored mobile voice services.

[0054] In some embodiments, the enterprise network administrator uses the enterprise service design center to create an enterprise sponsored service device group list that includes device credentials or device application credentials that the carrier network and/or the enterprise network can use to identify a device or an application on a device as belonging to the group of devices for which the enterprise desires to sponsor enterprise service activities. In some embodiments, a sponsored service activity policy set is created by an enterprise network administrator through an enterprise service design center UI, and an enterprise sponsored service device group list is created by an enterprise network administrator through an enterprise service design center UI, and the two lists are stored in the enterprise service design center in which they are associated with one another for the purpose of provisioning the carrier network, the enterprise network, and/or the devices to provide the desired enterprise sponsored services policy set to the enterprise sponsored services device group, as described herein with respect to various embodiments.

[0055] In some embodiments, the association between an enterprise sponsored services device group and an enterprise sponsored service policy set is used by a service design center to create a provisioning table, in which the provisioning table is a list of the provisioning programming required for the various carrier network elements, enterprise network elements, and/or device elements to implement the desired sponsored service activity policy set for the enterprise sponsored services device group.

[0056] For example, an enterprise can use the service design center to configure certain destinations/services as enterprise services or potentially enterprise services based on various factors (e.g., corporate sites, corporate email/email servers, corporate web pages/intranet, and can, for example, agree to pay for a certain level of general web browsing by usage/time of day and/or other factors, corporate contacts/calendars, corporate videoconferencing; and certain applications, such as web conferencing applications or other applications; certain telephone service usages, etc.). As another example, the service design center can present a configuration interface that allows users to select from one or more service plans that include various consumer and enterprise allocations and/or to select an enterprise only service plan.

[0057] In some embodiments, the service design center specifies one or more service plans the device user can select from and these service plan selection options are configured into a configuration interface on a device software application that allows users to select from one or more service plans that includes various consumer and enterprise allocations and/or to select an enterprise only service plan. In some embodiments, the configuration interface is made available directly on the device via a device client that provides a service plan selection user interface that displays one or more service plan options configured in the service design center or the enterprise service design center. In some embodiments, the configuration interface is presented directly on a device user interface (UI) when the user attempts to use an access service usage activity that requires a service plan to be activated or purchased. In some embodiments, the configuration interface presented via the device UI accepts a user response, transmits it to a carrier network element responsible for provisioning a new user service plan that in turn activates the service plan chosen by the user, possibly after confirming service payment credit for the user or enterprise entity. In some embodiments, the carrier network element responsible for provisioning a new user service plan is a carrier usage accounting server. In some

embodiments, the carrier network element responsible for provisioning a new user service plan is a consumer internet services element. In some embodiments, the carrier network element responsible for provisioning a new user service plan is a carrier gateway or home agent. In some embodiments the carrier network element responsible for provisioning a new user service plan is a billing system or service plan provisioning system. In some embodiments, the configuration interface is made available to the user in the form of a web site that provides a service plan selection user interface that displays one or more service plan options configured in the service design center or the enterprise service design center.

[0058] In some embodiments, the initial configuration of the end-user device includes one or more enterprise access service plans that allow the user to access certain applications or network destinations associated with enterprise access services, and the user can choose from one or more additional consumer oriented service plans offered directly on the device UI by a device software application in communication with a carrier network element responsible for provisioning a new user service plan that in turn activates the service plan chosen by the user, possibly after confirming service payment credit for the user or enterprise entity. In some embodiments, these access service plan options are configured with a service design center. In some embodiments, these access service plan options are configured with an enterprise service design center.

[0059] In some embodiments, enterprise data locally stored on the wireless communication device is secured and access to an enterprise network from the wireless communication device is secured so that only authorized devices or applications can access the network. In some embodiments, security for enterprise data and network access is accomplished by connecting the wireless communication device to the enterprise network via a secure mobile services application on the wireless communication device that connects via a secure channel to a secure mobile services gateway server in the enterprise network. In some embodiments, the SDC is programmed to provision the network and/or device apparatus to detect service usage communication with the mobile services gateway server and record that as a usage charge for network services. In some embodiments, such service usage communication with the mobile services gateway server is credited to the user's carrier account or used as a reimbursement to the user bill.

[0060] In some embodiments, determining the enterprise and consumer billing allocation for wireless communication device service usage activities is performed using a classifier implemented on the wireless communication device that classifies the monitored service usage activity (e.g., service usage can also be measured by the classifier and/or another function implemented on the wireless communication device, which can similarly be implemented in a secure execution area or in a secure memory), in which the classifier is executed in a secure execution area or a secure memory of the wireless communication device. In some embodiments, the security of the classifier is verified, periodically or at other times, using various techniques, such as by comparing a local service usage measure with a network based service usage measure and/or comparing a secured local service usage measure with another local service usage measure. In some embodiments, a secured application protects one or more enterprise applications (e.g., email, calendar, contacts, intranet access, and/or other enterprise specified applications, such as applications configured as approved or authorized enterprise applications for a particular enterprise by an enterprise manager using a service design center) from unauthorized use or tampering.

[0061] In some embodiments, the secure mobile services application also provides for usage monitoring of the enterprise service usage of the device. In some embodiments, the secure mobile services application also provides for service access control for the enterprise services of the device so that enterprise network access policies can be locally enforced on the device.

[0062] In some embodiments, security for enterprise data and network access is provided by connecting to the enterprise network via a secure mobile services application executed securely (e.g., in a virtual machine or in a hardware secured execution partition) on the wireless communications device that connects via a secure channel to a secure mobile services gateway server in the enterprise network. In some embodiments, security for enterprise data and network access is provided by connecting to the enterprise network via a secure mobile services application executed on a wireless communications device that includes a service processor, as described herein, that connects via a secure channel to a secure mobile services gateway server in the enterprise network. In some embodiments, the SDC is programmed to provision the network and/or wireless communications device apparatus to detect service usage communication with the mobile services gateway server, and record that as a usage charge for network services. In

some embodiments, such service usage communication with the mobile services gateway server is credited to the user's carrier account or used as a reimbursement to the user bill.

[0063] In some embodiments, the service processor also provides for service usage monitoring of the enterprise service usage of the device, as described herein with respect to various embodiments. In some embodiments, the service processor also provides for service access control for the enterprise services of the device so that enterprise network access policies can be enforced on the device, as described herein with respect to various embodiments.

[0064] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes associating the wireless communication device and/or an authorized user of the wireless communication device (e.g., using device/user credentials) with an enterprise account (and, in some embodiments, a consumer account), associating an application with a service, and associating the service with the enterprise account (e.g., a service for the wireless communication device that the enterprise agreed to pay for). In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities further includes using application-based monitoring and/or control using, for example, device assisted services.

[0065] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes crediting an associated consumer account for service usage allocated to an enterprise account. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes billing the enterprise for service usage allocated to the enterprise account. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes reporting to the enterprise (and, in some embodiments, the consumer) service usage allocated to the enterprise account, and the enterprise can, for example, provide an expense reimbursement to the consumer (e.g., employee, partner, associate, or contractor of the enterprise).

[0066] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes associating the wireless communication device with an enterprise account and a consumer account, associating an application with a

service, and associating the service with the consumer account (e.g., a service for the wireless communication device that the consumer, such as an employee of the enterprise, agreed to personally pay for). In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities further includes using application-based monitoring and/or control using, for example, device assisted services.

[0067] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes crediting an associated enterprise account for service usage allocated to a consumer account. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes billing the consumer for service usage allocated to the consumer account. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes reporting to the enterprise (and, in some embodiments, the consumer) service usage allocated to the consumer account, and the enterprise can, for example, deduct the cost for such service usage as an expense from the consumer's periodic/next paycheck.

In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities does not require a network element or a device element to control services. For example, a user with a device associated with a bulk service usage plan can be automatically credited for sponsored enterprise service usage. If the bulk service usage plan has a service plan cap associated with the user's consumer service plan, then the service usage classified as sponsored enterprise service usage can be deducted from the total service usage such that the sponsored enterprise service usage does not count towards the user's capped consumer service plan usage. As another example, an enterprise account associated with the wireless communication device and/or user can allow the user to exceed a monthly or other service plan cap for sponsored enterprise service usage (e.g., based on various criteria and/or other factors, such as a more restrictive enterprise service policy to avoid potential misuse of sponsored enterprise services for personal use).

[0068] In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities is provided using network-based and/or device-based techniques as described herein with respect to various embodiments. For example, using

various techniques described herein, an enterprise manager can control the services for wireless communication devices for the enterprise, including access to such services and/or charging for such services (e.g., services used by employees in which some are charged to the enterprise on behalf of the employee and some are charged to the employee as a consumer of such services) and user notification messages. For example, the enterprise manager or another network element/function can cap and/or control service usage for consumer services and/or enterprise services.

[0069] In some embodiments, a service usage reconciliation function is provided. In some embodiments, the service usage reconciliation function implements the rules for a billing split for the enterprise and consumer billing allocation for wireless communication device service usage activities, as described herein with respect to various embodiments. In some embodiments, the service usage reconciliation function also facilitates fraud detection, as described herein with respect to various embodiments.

Carrier Managed Billing Allocation With Service Usage Monitoring In Carrier Network

[0070] **Figure 1** illustrates a functional diagram of a network architecture 100 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. In some embodiments, a wireless communication device 110 includes a memory, an application processor (e.g., or more than one application processor or general processor), and a wireless modem, shown as an access modem 151. As shown, the wireless communication device 110 includes an operating system application space 131 for executing applications and communicating wirelessly using operating system lower layers 130, network stack 136, and the access modem 151. As used herein, application space refers to a portion of memory and a portion of a processor operating system execution environment for executing application programs. As also shown, the wireless communications device 110 includes operating system lower layers 130. As used herein, operating system lower layers refers to one or more OS layers that typically implement networking functions (e.g., network stack 136). In some embodiments, operating system lower layers 130 is where certain application data and communications security functions are implemented as described herein. In some embodiments, operating system lower layers 130 is

where certain service usage monitoring and reporting functions are implemented as described herein. In some embodiments, operating system application space 131 executes various user applications, including one or more of user data application 111 and user voice application 112, and various enterprise applications, including enterprise data application 124 and enterprise voice application 126. In some embodiments, the execution environment for user applications and enterprise applications is the same (e.g., as shown in Figures 1 through 7). For example, a consumer Internet browser can execute in the operating system application space 131 for providing Internet web site browsing or web based email service via network stack 136 and wireless access modem 151 (e.g., a wireless modem), and an enterprise email program can also execute in the operating system application space 131 to communicate with an enterprise email server also via network stack 136 and wireless access modem 151. In some embodiments, the execution environment for user applications and enterprise applications are not the same (e.g., as shown in Figures 8 through 12).

[0071] In some embodiments, device 110 accesses various network-based voice services, such as consumer voice services 167 and/or enterprise sponsored/paid-for consumer voice services usage, via voice network 165. As shown, voice network 165 is in communication with carrier access network 150 via carrier gateway/home agent (HA) 152. In some embodiments, device 110 accesses various Internet based services, such as consumer Internet services 162 and/or enterprise sponsored/paid-for consumer Internet services usage, via Internet 160.

[0072] As also shown in Figure 1, device 110 is in wireless communication (e.g., 2G/3G/4G access) with carrier access network 150. The carrier provides a carrier usage accounting server 154 (e.g., a carrier billing server) in communication with carrier access network 150. Carrier network access 150 is shown in communication with both Internet 160 and enterprise network 170 via Internet 160. Enterprise network 170 is shown in communication with Internet 160 as via enterprise firewall and secure access gateway 171 for protecting enterprise network 170 from unauthorized access. In some embodiments, to access enterprise network 170 through enterprise firewall and secure access gateway 171, device 110 includes a secure data application or a virtual private network application/function to facilitate secure authorization with enterprise firewall and secure access gateway 171 and to also protect the communication (e.g., encrypt such data communications). As also shown, behind enterprise firewall and secure access gateway 171,

enterprise network 170 provides communication with secure enterprise mobile services gateway/server 172 in communication with enterprise network 170. As shown, secure enterprise mobile services gateway server 172 includes various enterprise applications/functions, including as shown, mobile email 173, mobile synchronization 174, mobile contacts 175, mobile calendar 176, mobile communications 177, and mobile intranet 178. In some embodiments, secure enterprise mobile services gateway server 172 provides mobile device mobile access to various enterprise network intranet services via enterprise intranet servers 180. In some embodiments, the enterprise mobile services include email, contacts, calendar, enterprise communications, mobile device synchronization services, intranet internal web sites, internal enterprise applications, enterprise file systems, and/or other enterprise networking services. In some embodiments, secure enterprise mobile services gateway server 172 provides optimized mobile application formatting of the enterprise information or synchronization services to synchronize the enterprise database for the above services in an efficient and/or timely manner.

[0073] In some embodiments, carrier usage accounting server 154 (e.g., the carrier billing server) communicates (e.g., using secure communication techniques) with service usage reconciliation server function 158 to obtain reconciled service charging reports (e.g., reconciled billing reports) and/or enterprise service usage charging credit reports. In some embodiments, the reconciled service charging reports (e.g., reconciled billing reports) and/or enterprise service usage charging credit reports are processed by carrier usage accounting server 154 and reported as user usage record(s) 155 and/or enterprise usage record(s) 156. For example, mediating such charging and credit reports can be based on various factors as described herein (e.g., by application, time of day/day of week, and/or other factors). For example, the service usage charges that occur due to communication with the servers or services that are part of enterprise network 170, including secure enterprise mobile services gateway server 172 and intranet servers 180, can be counted as an enterprise service usage credit.

[0074] In some embodiments, enterprise service design center 194 issues device provisioning instructions for the device credential list from the enterprise services device group, and for each of the credentials, a service control policy is set on enterprise firewall/secure gateway 171 to allow properly authorized devices to reach the desired destinations listed on the enterprise service activity policy set. The provisioning of enterprise firewall/secure gateway 171 with the

enterprise service device group credentials and the enterprise service policy set is illustrated in Figure 1 by the "C" input designator.

[0075] In some embodiments, enterprise service design center UI 196 and enterprise service design center 194 are provided as shown in Figure 1. In some embodiments, enterprise service design center UI 196 and enterprise service design center 194 provide dedicated enterprise control of the network policy provisioning for configuring the service charging, accounting or billing allocation policies for differentiating between enterprise device service usage activities and consumer device service usage activities. Furthermore, in some embodiments, the portion of the enterprise network policy provisioning information that is needed to provision the carrier network elements to implement various techniques for allocating device service usage between enterprise and consumer activities is communicated between enterprise service design center 194 and carrier service design center 190.

[0076] A carrier provisioning system is typically not capable of providing direct access to an enterprise network administrator (e.g., carrier or enterprise personnel) for the purpose of provisioning such service charging capabilities. For example, such direct access is often not provided due to concerns related to the risk to the entire network that exists if network provisioning controls are made available to many different administrators to program charging allocation policies for many enterprises. However, as described herein, by isolating the required carrier network provisioning information to a secure service design center UI and policy configuration that only influences a small portion of the carrier network policy provisioning available to the carrier service design center and UI, the risk of causing such problems with the carrier network configuration is significantly reduced. Additionally, the process of performing the carrier side of the necessary provisioning is simplified for an administrator or in some cases can be automated.

[0077] The service design centers (e.g., carrier service design center 190 and enterprise service design center 194) are shown in Figure 1 and various other figures as separate network elements in order to more clearly define and discuss the functions of the service design centers. In some embodiments, enterprise service design center 194 is implemented in various other network elements (e.g., in enterprise network management apparatus, such as management

functions of secure enterprise mobile services gateway server 172 or other enterprise network management apparatus). In some embodiments, enterprise service design center 194 is implemented as a securely partitioned and managed device group interface to a subset of the provisioning capabilities of carrier network service design center 190. In some embodiments, enterprise service design center 194 is implemented as a securely partitioned and managed device group interface to a subset of the provisioning capabilities of a cloud-based secure enterprise mobile services network that is run by a centralized enterprise services provider such as an ASP or MVNO. As would be appreciated by one of ordinary skill in the art in view of the various embodiments described herein, enterprise service design center 194 can be implemented using various network and software/hardware architectures while providing for secure and controlled access as described herein.

[0078] In some embodiments, the enterprise service design center administrator creates or imports the enterprise service device group credentials and the enterprise service policy set using enterprise service design center UI 196. In some embodiments, the information included in the enterprise service device group credentials and the enterprise service policy set is also communicated from enterprise service design center 194 to carrier service design center 190 via the "C" connection designator as shown. For each of the device credentials listed in the enterprise services device group, carrier service design center 190 determines the information it needs to properly provision carrier gateway/home agent 152 with the proper access policy allowances and service usage charging policies to provide enterprise service access and usage credit for communications from device 110 to the enterprise network destination addresses specified in the enterprise service policy set. Programming of this provisioning information to carrier gateway/home agent 152 is indicated by the "A" information connector from carrier service design center 190 to carrier gateway/home agent 152. In some embodiments, this provisioning (e.g., programming) information sent via provisioning communication link "A" to carrier gateway/home agent 152 includes information to facilitate programming the enterprise device group credentials to: (i) receive the desired access service policy permissions, and (ii) implement the desired service usage accounting/charging policy settings. From the enterprise device group credentials list and the enterprise service activity policy set information provided in "C," carrier service design center 190 determines the information needed to properly provision the service usage reconciliation server function 158. Programming of this provisioning

information to service usage reconciliation server function 158 is indicated by the "B" information connector from carrier service design center 190 to service usage reconciliation server function 158. In some embodiments, service usage reconciliation function 158 is part of the carrier network, and service usage reconciliation function 158 implements the charging reconciliation rules to determine how much of the recorded device 110 service usage to place on the user's usage record or service bill (e.g., consumer service usage cost allocation) and how much to place on the enterprise's usage record or service bill (e.g., enterprise service usage cost allocation).

[0079] An enterprise may wish to allow consumer services on an end-user device that also allows an employee to access enterprise services over the access network. In some such embodiments, service design center 190 specifies one or more service plans from which the device user can select, and these service plan selection options are configured into a configuration interface on a device software application (e.g., user data app 111, user voice app 112 or service processor framework program 139 (shown, e.g., in Figure 16)) that allows users to select from one or more service plans, for example, one or more plans with both consumer and enterprise allocations, and/or an enterprise-only service plan. In some embodiments, the configuration interface is made available directly on the device via a device client that provides a service plan selection user interface that displays one or more service plan options configured in service design center 190 or enterprise service design center 194. In some embodiments, the configuration interface is presented directly on the device user interface (UI) when the user attempts an access service usage activity that requires a service plan to be activated or purchased. In some embodiments, the configuration interface presented to the device UI accepts a user response and assists in sending the user response to a carrier network element responsible for provisioning a new user service plan that in turn activates the service plan chosen by the user, possibly after confirming service payment credit for the user or enterprise entity. In some embodiments, the carrier network element responsible for provisioning a new user service plan is carrier usage accounting server 154. In some embodiments, the carrier network element responsible for provisioning a new user service plan is consumer Internet services elements 162. In some embodiments, the carrier network element responsible for provisioning a new user service plan is a carrier gateway/home agent 152. In some embodiments, the carrier network element responsible for provisioning a new user service plan is a billing system or service plan

provisioning system. In some embodiments, the configuration interface is made available to the user in the form of a web site that provides a service plan selection user interface that displays one or more service plan options configured in service design center 190 or enterprise service design center 194.

[0080] In some embodiments, the initial configuration of device 110 includes one or more enterprise access service plans that allow the user to access certain applications or network destinations associated with enterprise access services, and the user can choose from one or more additional consumer-oriented service plans offered directly on the device UI by a device software application (e.g., user data app 111, user voice app112, or service processor framework program 139) in communication with a carrier network element responsible for provisioning a new user service plan that in turn activates the service plan chosen by the user, possibly after confirming service payment credit for the user or enterprise entity. In some embodiments, these access service plan options are configured using service design center 190. In some embodiments, these access service plan options are configured using enterprise service design center 194.

[0081] In some embodiments in which a user has selected a consumer-oriented service plan in addition to an enterprise service plan, service usage reconciliation function 158 distinguishes between data usage within the enterprise service plan and data usage within the consumer-oriented service plan. In some embodiments, the enterprise does not pay for, backhaul, process, or police data usage associated with the consumer-oriented plan. In some embodiments, service usage reconciliation function 158 determines how much data usage by device 110 is enterprise data usage, and how much data usage by device 110 is consumer data usage. In some embodiments, service usage reconciliation function 158 allocates data usage associated with applications and/or services specified by the enterprise service plan to the enterprise, and data usage associated with applications and/or services specified by the consumer-oriented data plan to the consumer.

[0082] The various embodiments described herein with respect to Figure 1 support a variety of techniques for allocating service usage accounting or billing between enterprise services and consumer services. For example, service usage reconciliation function 158 can report measured

total usage, measured consumer usage, and/or measured enterprise usage to carrier usage accounting server 154. In some embodiments, the reconciliation service usage function (e.g., provided by service usage reconciliation function 158 and/or another element/function) implements the business rules that determine how much of the service usage to charge the user (e.g., a consumer service usage allocation) and how much of the service usage to charge the enterprise (e.g., an enterprise service usage allocation). In some embodiments, the service usage reconciliation service usage function records total device service usage, records total enterprise service activity service usage, and then subtracts the enterprise service usage from the total device service usage to determine a consumer service usage (e.g., a consumer service usage allocation). In some embodiments, service usage reconciliation function 158 passes on the enterprise service usage as a credit to the consumer account. In some embodiments, this credit is accounted for by the carrier billing the user at a reduced amount according to the credit and billing the enterprise for an increased amount according to the credit. In some embodiments, the credit is accounted for by communicating the credit to the enterprise so the enterprise can reimburse the consumer (e.g., generating an expense reimbursement for the credit to the consumer as an employee or contractor of the enterprise, directly paying the enterprise allocation of the carrier bill for the consumer, and/or various other approaches as described herein). In some embodiments, the credit is reported to the enterprise so that the enterprise can seek payment for the non-enterprise service usage (e.g., consumer service usage allocation) from the consumer (e.g., who can be an employee or contractor of the enterprise).

[0083] As another example, an enterprise allocation can also include providing an allowance for a certain level of monthly usage of data and/or voice. In some embodiments, carrier usage accounting server 154 generates a bill for the associated consumer account (e.g., associated with device 110, such as based on the device/user credentials) that reflects the cost of the service usage allocated to consumer service usage and a credit for the cost of service usage allocated to enterprise service usage (e.g., to offset the cost of the enterprise service usage, which can be billed to the enterprise account associated with the enterprise service usage for the device 110). As described herein, based on an allocation of enterprise and consumer service usage, various techniques for billing/charging and generating credits/reporting (e.g., the enterprise can generate the user/employee monthly expense reimbursements to compensate the user/employee for the determined cost of the enterprise service usage and/or other approaches as described herein) can

be provided using the network architecture 100 and/or other network architectures, as described herein.

[0084] In some embodiments, an enterprise manager manages service usage by specifying an access network service usage limit for a service usage activity (such as data service, voice service, text service, a roaming service, or a more detailed classification of data service such as one or more websites or one or more device applications), and, when that usage limit is reached for a device that is managed by the enterprise manager, a service usage notification message is generated. In some embodiments, the service usage notification message is configured through enterprise service design center UI 196. In some embodiments, the service usage notification message is delivered to device 110. In some embodiments, the service usage notification message is presented to the user via a user interface of device 110.

[0085] In some embodiments, the service usage notification message provides information about data usage or the status of device 100. In some embodiments, the service usage notification message is triggered by an event, e.g., detection that device 110 reaches a data usage ceiling, determination that device 110 is roaming, etc. In some embodiments, the service usage notification message provides real-time or near-real-time information about data usage. In some embodiments, the service usage notification message provides information about remaining data usage availability or entitlement. In some embodiments, the service usage notification message comprises a detailed report of enterprise usage by user, user group, device, device group, or location.

[0086] In some embodiments, secure enterprise mobile services gateway server 172 is a dedicated enterprise application server for a particular enterprise (e.g., company, government organization, school/university, or another entity). In some embodiments, secure enterprise mobile services gateway server 172 is a carrier or a third party service provider (e.g., a carrier for wireless network services, such as AT&T, Sprint, T-Mobile, and/or various other wireless network service providers/carriers or third party service providers) controlled/managed application server that performs the application server functions for various different enterprises (e.g., as a service/outsourced IT services model). In some embodiments, device 110 is partitioned (e.g., associated with a particular enterprise/MVNO partition and associated

enterprise account) based on device credentials and/or VPN to determine a service plan for managing (e.g., to determine how to allocate enterprise/consumer service usage for) device 110. In some embodiments, based on the partition determination of device 110, and the associated service plan for managing device 110, appropriate service usage monitoring and classification can be determined for providing an enterprise and consumer allocation for service usage activities of device 110 based on the associated service plan(s).

[0087] For example, by programming the business rules in service usage reconciliation function 158 that determine the service usage accounting allocation between enterprise services and consumer services, many approaches can be provided for creating a service that provides an enterprise service to a device when the device user has selected a consumer service plan or elected to pay for a consumer service plan. As an example, if the device user has chosen a service plan, the enterprise service usage accounted for in enterprise usage record 156 can be billed to the enterprise rather than the consumer. As another example, if the device user has chosen a service plan, the consumer service usage accounted for in user usage record 155 can be billed to the device user rather than the enterprise. As yet another example, if the device user has selected a service plan, the enterprise service usage can be communicated to the enterprise (e.g., and/or the device user), and the enterprise can issue a reimbursement to the device user for the enterprise portion of the user's bill, or pay the carrier directly for a portion of the user's bill, thus reducing the amount the user must pay. In some embodiments, the business rules in service usage reconciliation function 158 are programmed to provide the device user with a certain amount of service usage that may or may not be directly related to enterprise services.

[0088] For example, the user can be allocated a certain amount of general purpose browsing that includes network destinations that are not specified in the enterprise service activity policy set. In some embodiments, there is a cap to such general purpose browsing, and carrier service design center 190 can provision the network and/or the device to alert the user regarding how much of the enterprise sponsored browsing remains or when the enterprise sponsored internet browsing cap is reached or exceeded. In some embodiments, the business rules in service usage reconciliation function 158 are programmed to deduct the service usage associated with the enterprise sponsored general purpose browsing, up to the specified cap, from the user's bill. In this way, the user can be allocated an allowance for services that either the enterprise sponsors to

account for enterprise related service usage that may not be included in the enterprise service activity policy set or that the enterprise simply desires to sponsor to reduce the device user's consumer service plan billing.

[0089] In a similar manner, services other than browsing that are not necessarily associated with enterprise service usage can also be sponsored by the enterprise by properly provisioning the business rules in service usage reconciliation function 158. For example, a catch-all enterprise sponsored allowance (e.g., or cap) for "bulk" internet usage can be provided. The fact that the user is provided with such an allowance may be pointed out to the user if the user disputes how much of his or her device service usage cost should be covered by the enterprise and how much the user should cover personally. Another example is to provide a certain amount of voice minutes to any phone number or to phone numbers not in the enterprise service activity policy set.

[0090] In some embodiments, the business rules in service usage reconciliation function 158 are provisioned so that the enterprise specifically does not allow, sponsor, or pay for certain device service usage activities. In some embodiments, these service usage activities can include access to network destinations, applications, or services that pose security risks to enterprise data stored on device 110 or pose security risks to enterprise network 170. In some embodiments, these activities include access to network destinations, applications, or services that the enterprise does not wish to sponsor or that are potentially associated with user activity that violates enterprise policy or laws. For example, the business rules may be configured to allow only transmission of business data on approved networks, e.g., excluding free or unknown WiFi hotspots, or only when device 110 is connected to the network via a VPN. In some embodiments, such service usage activities that violate enterprise security policies or other service usage policies are blocked by the business rules programmed into the network or the device as specified in the enterprise service activity policy set.

[0091] By programming the business rules in service usage reconciliation function 158 that determine the service usage accounting allocation between enterprise services and consumer services, many approaches can be provided for creating a service that provides an enterprise service to a device when the device user has not selected a consumer service plan or elected to

pay for a consumer service plan. For example, if the device user has not chosen to select or pay for a consumer service plan, carrier gateway/home agent 152 can be programmed to allow service usage for the enterprise service policy set but deny all other access until the user chooses a consumer service plan. In some embodiments, when/if the consumer chooses a consumer service plan then access would be expanded beyond just the enterprise services, because when the service plan activation occurs, consumer service policy set in carrier gateway/home agent 152 will be updated to allow service (e.g., as the carrier administrator user of carrier service design center 190 programs a different set of consumer service access policies for each consumer service plan that can be chosen). In some embodiments, the user is allocated a certain amount of general purpose data access or voice minutes as described above even though the user does not have a consumer data plan. Another example is to provide the user with a certain monetary allowance that is sponsored by the enterprise rather than a service usage amount.

[0092] Although enterprise service design center 194 is shown provisioning mobile server usage counter 179 (e.g., shown in Figure 5) and enterprise firewall/secure gateway 171, it should be understood that not all device provisioning connections as shown from secure enterprise mobile services gateway/server 172 to device 110 are shown for device functions including secure mobile services application access, communication link provisioning (e.g., cryptographic encryption keys, VPN settings, and various other security/communication provisioning), security programs, service control programs, and program settings for enterprise service applications, such as email, calendar, contacts, mobile synchronization services, and traffic control. As shown, the labeled provisioning connections are provided as exemplary embodiments to assist in identifying the network elements that are provisioned for network access control and network service usage charging reporting. Those of ordinary skill in the art will appreciate that these additional device provisioning functions are not necessarily specifically called out with provisioning connection labels in each figure, and it will be apparent to one of ordinary skill in the art which of these device provisioning functions and connections are needed from enterprise service design center 194 and device 110. It will also be apparent to one of ordinary skill in the art in view of the various embodiments described herein that the various device provisioning connections and device element programming configurations needed to provision these device functions can be managed by secure enterprise mobile services gateway/server 172 via a device management communications link. It will also be apparent to one of ordinary skill in the art that,

in some embodiments, the flow of policy provisioning information for the various device elements that participate in establishing service usage monitoring and reporting policies or service access control policies starts in enterprise service design center 194 and flows through secure enterprise mobile services gateway/server 172 over a device management link, and through the device management link on device 110 to the device 110 functional elements that need to be provisioned. In various embodiments described herein, the device elements that are provisioned in some embodiments to set up enterprise services, service usage monitoring and reporting policies, or service usage access control policies include one or more of enterprise data application 124, enterprise voice application 126, secure mobile enterprise application environment 120 (shown, e.g., in Figure 8), secure network interface 128 (shown, e.g., in Figure 8), secure enterprise mobile services application 125 (shown, e.g., in Figure 13), virtual machine #2 secure enterprise application environment 118 (shown, e.g., in Figure 14), enterprise application secured hardware execution partition 106 (shown, e.g., in Figure 15), device service usage monitor 119 (shown, e.g., in Figure 17), service processor framework program 139 (shown, e.g., in Figure 16), and/or service processor kernel program 138 (shown, e.g., in Figure 16).

[0093] In some embodiments, service usage reconciliation function 158, or secure enterprise mobile services gateway/server 172, or another similar network function, is programmed to review traffic usage patterns of mobile device 110 for the purpose of determining if the device may have fallen into unauthorized hands or if the device secure enterprise communications and data management software may have been hacked or tampered with in a way that endangers enterprise security or causes the enterprise to be billed for usage that is not enterprise usage. For example, service usage reconciliation function 158 (e.g., or secure enterprise mobile services gateway/server 172) can be programmed to monitor "bulk" enterprise service usage for the enterprise device group and trigger a fraud detection alert for a device that exhibits enterprise usage that is higher than a pre-determined "normal" limit. As another example, service usage reconciliation function 158 can be programmed to monitor "bulk" enterprise service usage for the enterprise device group and trigger a fraud detection alert for a device that exhibits enterprise usage access patterns that are determined to be outside of "normal" limits. Examples of usage patterns can include usage as a function of time of day, duration of usage, usage above a certain

limit for a subset of service usage activities, and/or usage above a certain limit for all service usage activities.

[0094] In some embodiments, enterprise service design center 194 is configured to receive or accept a specification for an access network service usage limit (e.g., a service amount in minutes, bytes, or cost) for a service usage activity (such as a data service, a voice service, a text service, a roaming service, or a more detailed classification of a data service, such as one or more websites or one or more device applications), and the service usage limit is applied to one or more devices 110 or device groups (or users or user groups) managed by enterprise service design center 194. In some embodiments, enterprise service design center 194 is further configured to receive service usage records for device 110, which is managed by enterprise service design center 194, from a network element configured to monitor and report device 110 service usage (e.g., carrier usage accounting server 154, enterprise firewall/security gateway 171, or another network element), and when the usage limit is reached, to generate a service usage notification message. In some embodiments, enterprise service design center 194 is configured to deliver the service usage notification message to enterprise service design center UI 196. In some embodiments, enterprise service design center 194 is configured to deliver the service usage notification message to a software application of device 110 (e.g., service processor framework program 139 or user data app 111) for presentation to the device user through a user interface of device 110.

[0095] In some embodiments, enterprise service design center 194 is configured to receive or accept a specification for an access network service notification event consisting of a network access pattern achieved or attempted by device 110 that belongs to a device group (or user group) managed by enterprise service design center 194, wherein the network access pattern is access attempted or achieved by one or more pre-defined device applications, or access attempted or achieved by device 110 to one or more network destinations, websites or network servers. In some embodiments, enterprise service design center 194 is further configured to receive service usage records for device 110, which is managed by enterprise service design center 194, from a network element configured to monitor and report device 110 service usage (e.g., carrier usage accounting server 154, enterprise firewall/security gateway 171, or another network element), and when the service usage indicates that the network access pattern has

occurred, enterprise service design center 194 is further configured to send a notification message to enterprise service design center UI 196.

Carrier Managed Billing Allocation With Service Usage Monitoring In Carrier Network and Enterprise Firewall/Gateway

[0096] **Figure 2** illustrates a functional diagram of another network architecture 101 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 101 of Figure 2 is similar to network architecture 100 of Figure 1, except that in network architecture 101 of Figure 2, service usage reconciliation function158 receives service usage information from enterprise firewall/secure gateway 171 in addition to carrier gateway/home agent 152. This allows for various techniques that augment the capabilities of carrier gateway/home agent 152. For example, in networks in which it is impractical or infeasible for carrier gateway/home agent 152 to keep track of the service usage accounting allocation between the enterprise service policy set and consumer services for the devices in the device group, service usage reconciliation function 158 can receive total device service usage from carrier gateway/home agent 152, and receive the enterprise service usage from enterprise firewall/secure gateway 171. With this information, service usage reconciliation service usage function 158 can perform the allocation between enterprise service usage and consumer service usage without any detailed service usage reports from carrier gateway/home agent 152.

[0097] There are several reasons that the carrier network may not support numerous enterprise service customers with an enterprise/consumer allocation architecture that requires carrier gateway/home agent 152 to perform the necessary traffic classification or service usage classification as in the Figure 1 embodiment. For example, these reasons can include: (i) carrier gateway/home agent 152 does not have the detailed service usage classification capability (e.g., deep packet inspection function(s)) required to allocate service usage between the enterprise service policy set and consumer services for the devices in the device group, (ii) carrier gateway/home agent 152 is capable of performing the service monitoring required but can only do it for a limited number of devices (e.g., scaling issues), and/or (iii) there are too many device groups being managed by enterprise partners of the carrier creating a situation where the number

of specialized profiles that must be supported by carrier gateway/home agent 152 is larger than can be accommodated by the profile management capacity of the gateway system (e.g., scaling issues). As would now be apparent to those of ordinary skill in the art in view of the embodiments described herein, there are other reasons that can make it advantageous to provide the enterprise service usage from the enterprise network.

[0098] In some embodiments, provisioning with the service design centers and UIs for the embodiment shown in Figure 2 is similar to that of Figure 1. In some embodiments, the billing allocation capabilities of the two embodiments are similar if carrier gateway/home agent 152 is fully capable of differentiating service usage between the enterprise service policy set and the consumer services, but if not, then as discussed above, the billing allocation capabilities of the Figure 2 embodiment can be preferable in such environments.

[0099] Because the enterprise service usage is monitored by the enterprise network elements in the embodiments depicted in Figure 2, various service accounting or billing policies are available to the enterprise or carrier. For example, the amount of service usage resulting from enterprise services that occur during roaming conditions can be accounted for even when the carrier network does not receive detailed classification of service usage from roaming network partners. The business rules programmed into service usage reconciliation function 158 that are determined by the enterprise service activity policy set can break-out enterprise-service-related roaming charges separately from consumer-service-related roaming charges so that the enterprise-service-related roaming charges are sponsored or paid by the enterprise and consumer roaming service usage activities are not subsidized or are only partially subsidized. In addition, in some embodiments, secure enterprise mobile services gateway/server 172 includes the capability to determine if device 110 is roaming so that the access control policies specified in the enterprise service activity policy set can include modification or denial of access to enterprise network 170 services allowed by enterprise firewall/secure gateway 171 or secure enterprise mobile services gateway/server 172 during roaming conditions even though the access is not controlled by the carrier home network.

[00100] In some embodiments, an active network detection function is included on the device to assist the network policy enforcement elements to determine the type of network the device is

connected to or to determine if the device is on a home or roaming network, as described herein. For example, the service usage policy allowances provided by the enterprise service activity policy set can be programmed so that the allowances change depending on the availability of a particular network or set of networks, the time of day, the congestion state of a network, or the current cost of service on the network. For example, if the carrier home network is not available and only a roaming network is available, the allowance may be decreased or removed. As another example, if a certain network type is not available but another network type is (e.g., 2G is available instead of 3G or 3G is available instead of 4G), then the allocation can be reduced. As yet another example, if a variable charging policy is in place with the carrier for access when the network is busy or during certain times of day, then the enterprise sponsored allowance can be reduced during times of higher charging.

Enterprise Managed Billing Allocation With Service Usage Monitoring in Carrier Network And Enterprise Firewall/Gateway

[00101] Figure 3 illustrates a functional diagram of another network architecture 102 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 102 of Figure 3 is similar to network architecture 101 of Figure 2, except that in network architecture 102 of Figure 3, service usage reconciliation function 158 receives overall device service usage information from carrier usage accounting server 154 and also receives enterprise device service usage information from enterprise firewall/secure gateway 171. In some embodiments, there is no interaction between the provisioning of the carrier network and the provisioning of the enterprise network, and it is assumed that service usage reconciliation function 158 and enterprise usage accounting server 159 are both under the control of the enterprise administrator. This approach allows for various techniques that provide for enterprise allocation of consumer service usage and enterprise service usage without the need to interface to the carrier network other than to get the overall usage summary. For example, service usage reconciliation function 158 can receive total or "bulk" usage from carrier usage accounting server 154, receive enterprise service usage from enterprise firewall/secure gateway 171, and determine the amount of consumer service usage, enterprise service usage, and/or an enterprise service usage credit.

[00102] In some embodiments, provisioning with the service design centers and UIs for the embodiment shown in Figure 3 is similar to that of Figure 1 except that no provisioning of enterprise service parameters is required in the carrier network. The billing allocation capabilities are also similar if carrier gateway/home agent 152 is fully capable of differentiating service usage between the enterprise service policy set and the consumer services, but if not, then as discussed above, the billing allocation capabilities of the Figure 3 embodiment can be preferable in such environments. For example, using network architecture 102, the enterprise can deal directly with its employees without the need to bring the carrier into the consumer-versus-enterprise allocation process. As an example, the enterprise could have a policy in which consumers purchase their own mobile device services and then get credit for enterprise mobile device services at the end of each billing period. This credit can be provided back to the employee in the form of an expense reimbursement or an increase in their next paycheck.

Enterprise Usage Credit With Service Usage Monitoring in Enterprise Firewall/Gateway

[00103] **Figure 4** illustrates a functional diagram of another network architecture 103 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 103 of Figure 4 is similar to network architecture 102 of Figure 3, except that in network architecture 103 of Figure 4, service usage reconciliation server function 158 receives no overall device service usage information from the carrier network. As shown in Figure 4, the source of service usage information is enterprise network 170 (e.g., via the enterprise firewall/secure gateway 171). In some embodiments, there is no interaction between the provisioning of the carrier network and the provisioning of the enterprise network, and it is assumed that service usage reconciliation function 158 and enterprise usage accounting server 159 could both be under the control of the enterprise administrator. For example, network architecture 103 of Figure 4 can be less dependent on the carrier than network architecture 102 of Figure 3 in that no billing information feed is provided. Using various techniques described herein, an enterprise service usage credit can be determined, and the determined enterprise service usage credit can be reimbursed to the device user.

Carrier Managed Billing Allocation With Service Usage Monitoring In Carrier Gateway/Home Agent And Enterprise Mobile Services Gateway Server

[00104] **Figure 5** illustrates a functional diagram of another network architecture 200 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 200 of Figure 5 is similar to network architecture 101 of Figure 2, except that in network architecture 200 of Figure 5, secure enterprise mobile services gateway/server 172 includes mobile server usage monitor 179, and the enterprise service usage reports from this function are sent to service usage reconciliation function 158 instead of usage reports being sent from enterprise firewall/secure gateway 171. In some embodiments, various specialized needs of monitoring, recording, and reporting enterprise service usage are confined to the special-purpose secure enterprise mobile services gateway/server 172 rather than requiring the often more general-purpose enterprise firewall/secure gateway 171 to perform these functions.

Enterprise Managed Billing Allocation With Service Usage Monitoring in Carrier Network And Enterprise Mobile Services Gateway Server

[00105] **Figure 6** illustrates a functional diagram of another network architecture 201 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 201 of Figure 6 is similar to network architecture 102 of Figure 3, except that in network architecture 201 of Figure 6, secure enterprise mobile services gateway/server 172 includes mobile server usage monitor 179, and the enterprise service usage reports from this function are sent to service usage reconciliation function 158 instead of usage reports being sent from enterprise firewall/secure gateway 171. For example, this approach allows for the specialized needs of monitoring, recording, and reporting enterprise service usage to be performed by the special-purpose secure enterprise mobile services gateway/server 172 rather than requiring the often more general-purpose enterprise firewall/secure gateway 171 to perform such functions.

Enterprise Usage Credit With Service Usage Monitoring in Enterprise Mobile Services Gateway Server

[00106] **Figure 7** illustrates a functional diagram of another network architecture 202 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 202 of Figure 7 is similar to network architecture 103 of Figure 4, except that in network architecture 202 of Figure 7, secure enterprise mobile services gateway/server 172 includes mobile server usage counter 179, and the enterprise service usage reports from this function are sent to service usage reconciliation function 158 instead of usage reports being sent from enterprise firewall/secure gateway 171. For example, this approach allows for the specialized needs of monitoring, recording and reporting enterprise service usage to be performed by the special-purpose secure enterprise mobile services gateway/server 172 rather than requiring the often more general-purpose enterprise firewall/secure gateway 171 to perform such functions.

Carrier Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Service Usage Monitoring In Carrier Network

[00107] **Figure 8** illustrates a functional diagram of another network architecture 300 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. As shown, secure mobile enterprise application environment 120 and secure network interface 128 within secure mobile enterprise application environment 120 are included in device 110. Also, server secure network interface 127 is included in secure enterprise mobile services gateway/server 172. In some embodiments, secure mobile enterprise application environment 120 protects sensitive enterprise information that is stored on device 110 (e.g., email text and downloads, calendar information, contacts, intranet data, or any other enterprise data) and provides a secure communication channel function to allow for authentication with server secure network interface 127 on secure enterprise mobile services gateway/server 172. As also shown, a user services application environment in device 110 includes various user applications, such as user data application 111 and user voice application 112.

[00108] In some embodiments, provisioning of the various network architecture elements to facilitate the allocation between enterprise service usage accounting or billing and consumer service usage accounting or billing is established as follows. The device portion of secure

network interface 128 and the enterprise server portion of server secure network interface 127 are provisioned with connection "E." In some embodiments, this provisioning operation with the connection labeled "E" includes programming information for secure network interface 128 to direct enterprise network 170 access traffic associated with application functions running in secure mobile enterprise application environment 120 to enterprise network 170 destinations that are to be sponsored (and, in some embodiments, possibly intermediate network routes) according to the enterprise services policy set, including, for example, the addresses (e.g., IP, IP/port or other higher layer address identifiers) of secure enterprise mobile services gateway/server 172 or enterprise intranet servers 180. In some embodiments, the provisioning operation designated with the connection label "E" also establishes the parameters required for the secure communication of information between secure network interface 128 and server secure network interface 127. In some embodiments, this provisioning step sets up the policies for the authentication process, data encryption, and cryptographic key exchange processes take place to establish secure communication between secure mobile enterprise application environment 120 and secure enterprise services gateway/server 172.

[00109] In some embodiments, the enterprise network destinations that are to be sponsored according to the enterprise services policy set identified by provisioning connection "E" are also communicated to carrier service design center 190. For example, this allows carrier service design center 190 to determine and transmit the proper provisioning information to establish the access control policies or service usage accounting policies for these aspects of the enterprise services policy set. Carrier service design center provisioning connections "A" communicate the provisioning information (programming) to carrier gateway/home agent 152. Carrier service design center provisioning connections "B" communicate the provisioning information (programming) to service usage reconciliation function 158.

[00110] In some embodiments, the provisioning operation associated with the provisioning connection label "C" provisions enterprise firewall/secure gateway 171 to admit devices 110 with device credentials or application credentials that belong to the desired enterprise services device group associated with the enterprise service policy set. In some embodiments, the provisioning information labeled as "C" includes enterprise network 170 destinations that are to be sponsored (and, in some embodiments, possibly intermediate network routes) according to the

enterprise services policy set. In some embodiments, the provisioning information labeled as "C" includes only the network destinations for secure enterprise mobile services gateway/server 172, and devices 110 are not allowed access to other parts of enterprise network 170.

[00111] In some embodiments, network architecture 300 for providing enterprise and consumer billing allocation for wireless communication device service usage activities includes executing an enterprise application as a secure enterprise data application 124 in secure mobile enterprise application environment 120 of device 110 in which the secure applications are in network communication (e.g., secure network communication, such as via a virtual private network (VPN) or other secure network communication techniques) with secure enterprise mobile services gateway/server 172 (e.g., executing an enterprise server side of the enterprise authorized/sponsored applications, such as an enterprise email server, an enterprise calendar server, an enterprise contacts server, and/or an enterprise network access server) of the enterprise. In some embodiments, the secure enterprise mobile services gateway/server 172 performs application monitoring that includes counting application service usage (e.g., bytes used in communicating with the device's execution of secure enterprise application 124). In some embodiments, secure enterprise mobile services gateway/server 172 performs application monitoring that further includes classifying application service usage (e.g., classifying secure enterprise application 124 by application/service usage activity such as based on application name or using signed code/hash techniques, by time of day/day of week, enterprise server, destinations, enterprise intranet, and/or other factors).

Carrier Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Carrier Network

[00112] **Figure 9** illustrates a functional diagram of another network architecture 301 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 301 of Figure 9 is similar to network architecture 300 of Figure 8, except that in network architecture 301 of Figure 9, secure enterprise mobile services gateway/server 172 is located between the Internet 160 and enterprise network 170. For example, this approach allows for server secure network interface

127 of secure enterprise mobile services gateway/server 172 to restrict access to enterprise network 170 and enterprise intranet servers 180 based on device authentication and/or various other security techniques (e.g., secure access, authentication, and/or communication techniques), as would be apparent to one of ordinary skill in the art in view of the various embodiments described herein.

Carrier Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Carrier Network And Mobile Services Gateway Server

[00113] **Figure 10** illustrates a functional diagram of another network architecture 302 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 302 of Figure 10 is similar to network architecture 301 of Figure 9, except that in network architecture 302 of Figure 10, secure enterprise mobile services gateway/server 172 includes mobile service usage monitor 179 that reports enterprise service usage to the service usage reconciliation function 158. In some embodiments, various specialized needs of monitoring, recording, and reporting enterprise service usage are confined to the special-purpose enterprise mobile services gateway/server 172 rather than requiring the often more general-purpose enterprise firewall/secure gateway 171 and/or other network elements/functions to perform such functions.

Enterprise Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Mobile Services Gateway Server

[00114] **Figure 11** illustrates a functional diagram of network architecture 303 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 303 of Figure 11 is similar to network architecture 302 of Figure 10, except that network architecture 303 of Figure 11 includes another carrier usage accounting server 154B that reports service usage to service usage reconciliation function 158. In some embodiments, carrier usage accounting server 154B receives overall or bulk service usage data from carrier gateway/home agent 152 and forwards such information to service usage reconciliation function 158. Service usage reconciliation

function 158 reconciles the overall or bulk service usage received from carrier accounting server 154B and the enterprise service usage received from mobile server usage monitor 179 and provides such reconciled service usage information to carrier usage accounting server 154A.

Enterprise Usage Credit With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Mobile Services Gateway Server

[00115] **Figure 12** illustrates a functional diagram of network architecture 304 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 304 of Figure 12 is similar to network architecture 303 of Figure 11, except that in network architecture 304 of Figure 12, the only service usage reported to service usage reconciliation function 158 is the enterprise service usage received from mobile server usage monitor 179. In some embodiments, service usage reconciliation function 158 reconciles the enterprise service usage received from mobile server usage monitor 179 and provides such reconciled service usage information to carrier usage accounting server 154, which generates enterprise service usage record(s) 156.

Device Configurations Without Service Usage Monitoring and Reporting

[00116] **Figure 13** illustrates a functional diagram of a secure device application architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. As shown, device 110 includes an operating system application space 131, operating system lower layers 130 including network stack 121, and access modem (e.g., wireless modem) 129. As also shown, operating system application space 131 includes various user applications, such as user data application 111 and user voice application 119, and service usage monitor 119. Operating system application space 131 also includes secure enterprise mobile services application 125, which includes various enterprise applications, such as email, synchronization, contacts, calendar communications, and intranet. Secure enterprise mobile services application 125 also includes secure network interface 128 (e.g., for securely communicating with an enterprise network).

[00117] **Figure 14** illustrates a functional diagram of another secure device virtual machine architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 14 is similar to Figure 13, except that in Figure 14 the user applications are executed/stored within virtual machine (VM) #1 consumer application environment117, and secure enterprise mobile services application 125 is included within virtual machine (VM) #2 secure enterprise application environment 118. Device 110 also includes virtual machine operating system 115 that includes virtual OS instantiation #1 117A for VM #1 consumer application environment 117 and virtual OS instantiation #2 118A for VM #2 secure enterprise application environment 118. As also shown, virtual machine operating system 115 includes virtual machine OS network stack 116.

[00118] **Figure 15** illustrates a functional diagram of another secure device hardware execution partition architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 15 is similar to Figure 14, except that in Figure 15 hardware partitions are provided instead of virtual partitions. As shown, the user applications are executed/stored within user application secured hardware execution partition 105 and secure enterprise mobile services application 125 is included within enterprise application secured hardware execution partition 106. Device 110 also includes secured hardware partition for OS 115 that includes secure hardware partition manager #1 107 for user application secured hardware execution partition 105 and secure hardware partition manager #2 108 for enterprise application secured hardware execution partition 106. As also shown, secured hardware partition for OS 115 includes OS network stack 116.

[00119] **Figure 16** illustrates a functional diagram of another secure device service processor architecture for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. As similarly described herein with respect to various embodiments, the device architecture of Figure 16 includes service processor framework program 139 (e.g., framework space agent/function) and network stack framework components 137 in operating system framework space 133, and service processor kernel program 138 (e.g., kernel space agent/function) and network stack kernel components 135 in operating system kernel space 132. In some embodiments, the service processor functions

provide a user interface function to communicate to a user of device 110 whether or not a service usage activity is an approved/authorized service usage activity, or whether it is a disallowed service usage activity for device 110 (e.g., the enterprise has disallowed the usage of device 110 for such service usage activities, such as online gaming and/or certain other online activities or certain long distance calling or voice usage during certain days, such as weekends) or whether such would/will be charged/billed to the user as a consumer under the user's consumer plan. In some embodiments, the service processor functions provide a user interface function to communicate to a user of device 110 an associated cost of certain service usage activities allocated to consumer service usage. In some embodiments, the service processor functions provide a user interface function to communicate to a user of device 110 an associated credit of certain service usage activities allocated to enterprise service usage. In some embodiments, the service processor functions provide a user interface function to communicate to a user of device 110 various other information as described herein with respect to providing an enterprise and consumer allocation for service usage activities. In some embodiments, the service processor shown in Figure 16 communicates with a service controller, such as described herein with respect to various embodiments.

Carrier Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Carrier Network And On Device

[00120] **Figure 17** illustrates a functional diagram of another network architecture 400 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 400 of Figure 17 is similar to network architecture 302 of Figure 10, except that as shown in Figure 17, device 110 also includes service usage monitor 119 (e.g., agent/function) in secure mobile enterprise application environment 120. In some embodiments, service usage monitor 119 performs application monitoring that includes counting application service usage for secure data application 124 and secure voice application 126 (and, in some embodiments, for also counting application service usage for user applications that are not enterprise or secure enterprise applications 124 or 126). In some embodiments, counting application service usage includes counting bytes or network connection time used in communicating via carrier access network

150 during the device's execution of monitored data applications. In some embodiments, counting application service usage includes counting voice network connection time used in communicating via carrier access network 150 during the device's execution of monitored voice applications. In some embodiments, service usage monitor 119 performs application monitoring that further includes classifying application service usage for secure enterprise applications 124, 126 (e.g., classifying various secure enterprise applications 124, 126 and in some embodiments, including ambient services classification/determination, by application/service usage activity such as based on application name or using signed code/hash techniques, by time of day/day of week, enterprise server, destinations, enterprise intranet, and/or other factors).

[00121] In some embodiments, carrier usage accounting server 154 communicates (e.g., using secure communication techniques) with service usage monitor 119 to mediate billing/charging and credit reports, for example, using the various approaches and techniques as described herein.

[00122] In some embodiments, service usage monitor 119 and/or another function/agent executed in secure mobile enterprise application environment 120 of device 110 blocks user access for non-enterprise activities that the user has not agreed to pay for.

[00123] Because the enterprise service usage is monitored by the device network elements in the embodiments depicted in Figure 17, various service accounting or billing policies are available to the enterprise or carrier. For example, the amount of service usage resulting from enterprise services that occur during roaming conditions may be accounted for even when the carrier network does not receive detailed classification of service usage from roaming network partners. The business rules programmed into service usage reconciliation function 158 that are determined by the enterprise service activity policy set can break-out enterprise service related roaming charges separate from consumer service related roaming charges. In addition, in some embodiments, the device secure mobile enterprise environment includes an access control function so that the access control policies specified in the enterprise service activity policy set can be enforced on roaming networks that have access that is not controlled by the carrier home network.

[00124] For example, the allowances provided by the enterprise service activity policy set can be programmed so that the allowances change depending on the availability of a particular

network or set of networks, the time of day, the congestion state of a network, or the current cost of service on the network. As another example, if the carrier home network is not available and only a roaming network is available, the allowance can be decreased or removed. As yet another example, if a certain network type is not available but another network type is (e.g., 2G is available instead of 3G or 3G is available instead of 4G), then the allocation can be reduced. As yet a further example, if a variable charging policy is in place with the carrier for access when the network is busy or during certain times of day, then the enterprise sponsored allowance can be reduced during times of higher charging. As described herein, in some embodiments, an active network detection function can be included on the device to assist the network policy enforcement to determine the type of network the device is connected to or to determine if the device is on a home or roaming network. As also described herein, in some embodiments, a network busy state monitor function can be included on the device to assist the network policy enforcement to determine the network busy state or state of network congestion.

Carrier Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring In Carrier Network, On Device, And In Enterprise Mobile Services Gateway Server

[00125] **Figure 18** illustrates a functional diagram of another network architecture 401 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 401 of Figure 18 is similar to network architecture 400 of Figure 17, except that in network architecture 401 of Figure 18, secure enterprise mobile services gateway/server 172 includes mobile server usage counter 179, and the enterprise service usage reports from this function are sent to service usage reconciliation function 158. In some embodiments, various specialized needs of monitoring, recording, and reporting enterprise service usage are confined to the special-purpose secure enterprise mobile services gateway/server 172.

Enterprise Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring On Device And In Enterprise Mobile Services Gateway Server

[00126] **Figure 19** illustrates a functional diagram of another network architecture 402 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 402 of Figure 19 is similar to network architecture 401 of Figure 18, except that network architecture 402 of Figure 19 does not include the service usage feed from carrier gateway/home agent 152, and service usage reconciliation function 158 relies solely on a device service usage feed from device 110 usage monitors 119 and secure enterprise mobile services gateway/server 172 mobile service usage monitor 179. In some embodiments, service usage reconciliation function 158 and enterprise service usage accounting server 159 are under the control of the enterprise or the carrier. For example, an enterprise entity can establish enterprise service and consumer service usage allocation accounting without the need to tie into the carrier network for usage feeds and usage accounting. Using various techniques described herein, an enterprise service usage credit can be determined, and the determined enterprise service usage credit can be reimbursed to the device user.

Enterprise Managed Billing Allocation With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring On Device

[00127] **Figure 20** illustrates a functional diagram of another network architecture 403 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 403 of Figure 20 is similar to network architecture 402 of Figure 19, except that in network architecture 403 of Figure 20, service usage reconciliation function 158 receives feeds from device 110 service usage monitors 119 and there is no feed from the secure enterprise mobile services gateway server.

Enterprise Usage Credit With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Service Usage Monitoring On Device And In Enterprise Mobile Services Gateway Server

[00128] **Figure 21** illustrates a functional diagram of another network architecture 404 for providing enterprise and consumer billing allocation for wireless communication device service

usage activities in accordance with some embodiments. Network architecture 404 of Figure 21 is similar to network architecture 402 of Figure 19, except that in network architecture 404 of Figure 21, there is no service usage monitor function 119 in user services application environment 122 providing service usage reports/information to service usage reconciliation function 158, and enterprise usage accounting server 159 only generates enterprise usage records 156.

Enterprise Usage Credit With Device Mobile Enterprise Services Application Environment and Mobile Services Gateway Server With Usage Monitoring On Device

[00129] **Figure 22** illustrates a functional diagram of another network architecture 405 for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Network architecture 405 of Figure 22 is similar to network architecture 404 of Figure 21, except that network architecture 405 of Figure 22 does not include mobile server usage monitor 179 providing enterprise service usage reports/information to service usage reconciliation function 158.

Device Configurations With Service Usage Monitoring and Reporting

[00130] In some embodiments, secure enterprise mobile services application 125 and network stack 121 can be implemented in access modem 129, as described below with respect to Figures 23 through 26.

[00131] **Figure 23** illustrates a functional diagram of a secure device application architecture with device-based service usage monitoring (and in some embodiments, access control) for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 23 is similar to Figure 13 except that in Figure 23 usage monitor 119 is provided as shown, and secure enterprise mobile services application 125 and network stack 121 can be implemented in access modem 129 as also shown.

[00132] **Figure 24** illustrates a functional diagram of a secure device virtual machine architecture with device-based service usage monitoring (and in some embodiments, access control) for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 24 is similar to

Figure 14 except that in Figure 24, usage monitor 119 is provided as shown, and secure enterprise mobile services application 125 and virtual machine OS network stack 116 can be implemented in access modem 129 as also shown.

[00133] **Figure 25** illustrates a functional diagram of a secure device hardware execution partition architecture with device-based service usage monitoring (and in some embodiments access control) for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 25 is similar to Figure 15 except that in Figure 25 usage monitor 119 is provided as shown, and secure enterprise mobile services application 125 and virtual machine OS network stack 116 can be implemented in access modem 129 as also shown.

[00134] **Figure 26** illustrates a functional diagram of a secure device service processor architecture with device based service usage monitoring (and in some embodiments, access control) for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. Figure 263 is similar to Figure 16 except that in Figure 26 usage monitor 119 is provided as shown, and secure enterprise mobile services application 125, service processor framework 139, and service processor kernel program 138, can be implemented in the access modem 129 as also shown.

[00135] In some embodiments, service processor framework program 139 (or service processor kernel program 138) interacts with network stack framework components 137 or network stack kernel components 135 to inspect traffic for service usage classification and service policy enforcement (e.g., access control policy enforcement, traffic control policy enforcement, service usage accounting, charging policy enforcement, or service notification policy enforcement) purposes. In some embodiments, one or more of network stack framework components 137 and network stack kernel components 135 provides classification information on one or more traffic flows to service processor framework program 139 (or service processor kernel program 138). In some embodiments, service processor framework program 139 (or service processor kernel program 138) seeks to match the classification information to one or more classification parameters contained in the service policy definitions in order to determine the service policy enforcement actions that may be required for a traffic flow. In some embodiments, a traffic flow

is a flow of data packets. In some embodiments, a traffic flow is a flow of one or more data packets that are associated with a device application, the association of a traffic flow to a device application being identified by network stack framework components 137 or network stack kernel components 135 or service processor framework program 139 (or service processor kernel program 138). In some embodiments, the service usage classification determines that the traffic flow is associated with a combination of one or more of: a device application, a network destination, a traffic type, a content type, a QoS level, a roaming network, a home network.

[00136] In some embodiments, the association of traffic flow to a specific device application is used to determine a service policy enforcement action that is dependent on the specific device application. In some embodiments, a specific device application identifier (e.g., an application name, application signature, application hash or application certificate) forms an application credential that is used to index a service policy enforcement action that is intended to be implemented following a service usage activity or attempted service usage activity by the specific device application. In some embodiments, a specific device application is verified as consistent with an application credential in order to ensure that an application service policy enforcement action intended to be applied to the specific device application is applied to the correct application. In some embodiments, the verification that a specific application is consistent with an application credential associated with a service policy enforcement action is performed in service processor framework program 139 (or service processor kernel program 138) to ensure that ensure that an application service policy enforcement action intended to be applied to the specific device application is applied to the correct application. In some embodiments, the verification that a specific application is consistent with an application credential associated with a service policy enforcement action is performed in network stack framework components 137 or network stack kernel components 135, and service processor framework program 139 (or service processor kernel program 138) ascertains the application credential verification to ensure that ensure that an application service policy enforcement action intended to be applied to the specific device application is applied to the correct application.

[00137] In some embodiments, the association of traffic flow to a specific device application is used to determine a service policy enforcement action that is dependent on the specific device application, and service processor framework program 139 (or service processor kernel program

138) instructs network stack framework components 137 or network stack kernel components 135 to implement the service policy enforcement action on the traffic flow associated with the specific device application. In some embodiments, the association of traffic flow to a specific device application is used to determine a service policy enforcement action that is dependent on the specific device application, and service processor framework program 139 (or service processor kernel program 138) implements the service policy enforcement action. In some embodiments, a traffic flow is buffered pending classification (e.g., buffered in one or more of network stack framework components 137, network stack kernel components 135, service processor framework program 139, or service processor kernel program 138). In some embodiments, upon classification of the traffic flow (e.g., determination of an association of the traffic flow to a specific device application), a service policy enforcement action that is dependent on the specific device application is determined by service processor framework program 139 (or service processor kernel program 138) and implemented in one or more of network stack framework components 137, network stack kernel components 135, service processor framework program 139, and service processor kernel program 138. In some embodiments, the service policy enforcement action for the traffic flow is implemented in service processor framework program 139 (or service processor kernel program 138). In some embodiments, service processor framework program 139 (or service processor kernel program 138) instructs a device UI program that displays a device service notification (e.g., a service usage notification, a service plan offer notification, or an indication of a service usage event or attempted service usage event that requires a user notification) to implement the service policy enforcement action for the traffic flow. In some embodiments, service processor framework program 139 (or service processor kernel program 138) instructs a service usage monitor (e.g., accounting traffic to bulk classification or a more detailed classification of service usage) to implement the service policy enforcement action for the traffic flow.

[00138] In some embodiments, the network destination of a traffic flow is used to determine if a service policy enforcement action that is dependent on a specific network destination should be applied to the traffic flow. In some embodiments, a traffic flow is inspected by network stack framework components 137 or network stack kernel components 135, and one or more traffic characteristics (e.g., an address, a socket/flow tuple, a layer-7 packet information, or a packet header string) are passed to service processor framework program 139 (or service processor

kernel program 138), wherein the one or more traffic characteristics are matched against one or more classification parameters contained in a service policy definition, and if a match is present then a service policy enforcement action is implemented for the traffic flow. In some embodiments, a traffic flow is inspected by service processor framework program 139 (or service processor kernel program 138), and one or more traffic characteristics (e.g., an address, a socket/flow tuple, a layer-7 packet information, or a packet header string) are matched against one or more classification parameters contained in a service policy definition, and if a match is present then a service policy enforcement action is implemented for the traffic flow. In some embodiments, the service policy enforcement action for the traffic flow is implemented in service processor framework program 139 (or service processor kernel program 138). In some embodiments, service processor framework program 139 (or service processor kernel program 138) instructs network stack framework components 137 or network stack kernel components 135 to implement the service policy enforcement action for the traffic flow. In some embodiments, the service policy enforcement action for the traffic flow is implemented by a device UI program that displays a device service notification (e.g., a service usage notification, a service plan offer notification, or an indication of a service usage event or attempted service usage event that requires a user notification). In some embodiments, the service policy enforcement action for the traffic flow is implemented by a service usage monitor (e.g., accounting traffic to bulk classification or a more detailed classification of service usage).

[00139] In some embodiments, an enterprise manger can define or select service plan policies that confine enterprise-sponsored access services to a pre-defined list of device applications. For example, an enterprise manager might choose to define or select a service plan wherein only corporate applications may be accessed (e.g., email, contacts, intranet services, text, and/or voice). In such embodiments, enterprise service design user interface 196 may be used by the enterprise manager to define or select the allowable applications that are to have access. In some embodiments, an enterprise access manager may define or select a different set of applications to be accessible when device 110 is roaming than when device 110 is on a home network or on a WiFi network. In some embodiments, an enterprise manager may define or select a set of applications that are to be not allowed access when a device is on a certain network (e.g., a roaming network). For example, many modern smart phone, tablet, and laptop operating systems have background services that have the potential to incur large roaming charges during

roaming conditions (e.g., Google Android "gallery" functions that share device data with the Google network, Microsoft "system" functions that do the same, software update programs, etc.). In such cases, enterprise service design center 194 may be used to specify the device applications that are not allowed to access the network during certain network conditions.

[00140] In some embodiments, the identification and network access control for a device application is performed with a device software program or agent (e.g., service processor framework program 139 or service processor kernel program 138), and enterprise service design center 194 programs the device agent with the application identification parameters and associated access policies. In some embodiments, the device agent identifies the application using an application name, certificate, signature, or hash for an application running on the device and a policy instruction stored on the device.

[00141] In some embodiments, the identification and network access control for a device application is performed with one or more network access policy enforcement elements (e.g., carrier gateway/home agent 152, carrier usage accounting server 154, enterprise firewall/security gateway 171), and enterprise service design center 194 causes the one or more network access policy enforcement elements to be provisioned with the application identification parameters and associated access policies. In some embodiments, the one or more network access policy enforcement elements identify an application by observing the traffic headers inserted by the application. In some embodiments, the one or more network access policy enforcement elements identify an application by observing the network destinations or destination patterns accessed by the application. In some embodiments, the one or more network access policy enforcement elements identify an application by routing or tunneling the application traffic to one or more network gateways or servers associated with the application (e.g., APN routes, dedicated application addressing, or a device agent that steers the application traffic to a server). In some embodiments, the device assists in this routing or tunneling with a device agent that is programmed to route or re-direct the traffic for an application.

[00142] In some embodiments, an enterprise manger can define or select service plan policies that confine enterprise-sponsored access services to a pre-defined list of network destinations, servers, or resources. For example, an enterprise manager might choose to define or select a

service plan wherein only corporate network destinations may be accessed (e.g., email server, contacts server, intranet servers, text service servers, and VOIP servers). In some embodiments, enterprise service design center interface 196 may be used by an enterprise manager to define or select the allowable network destinations that device 110 may access. In some embodiments, the enterprise access manager may define or select a different set of network destinations when device 110 is roaming than when device 110 is on a home network or on a WiFi network. In some embodiments, an enterprise manager may define or select a set of network destinations that device 110 cannot access when device 110 is on a certain network (e.g., a roaming network). For example, many websites and enterprise services exhibit network access service usage behavior that can incur large roaming charges during roaming conditions (e.g., software update websites or servers, contact database synchronization websites, email download synchronization websites, video conference websites, etc.). In such cases, enterprise service design center 194 may be used to specify the device applications, services, and/or websites that are not to be accessed or used during certain network connection conditions.

[00143] In some embodiments, a device agent identifies the network destination and applies the appropriate access policy by comparing traffic characteristics with pre-defined characteristics in the access policy instructions provisioned on device 110, and then applies the corresponding traffic control rule, and enterprise service design center 194 performs the provisioning of the device agent. In some embodiments, the identification and network access control for a network destination is performed with one or more network access policy enforcement elements (e.g., carrier gateway/home agent 152, carrier usage accounting server 154, enterprise firewall/security gateway 171) and enterprise service design center 194 performs the provisioning of the one or more network elements.

[00144] In some embodiments, enterprise service design center 194 is configured to receive or accept a specification for an access network service usage limit (e.g., a service amount in minutes, bytes, or cost) for a service usage activity (such as a data service, a voice service, a text service, a roaming service, or a more detailed classification of data service such as one or more websites or one or more device applications), and the service usage limit is applied to one or more devices 110 or device groups (or users or user groups) managed by enterprise service design center 194. In some embodiments, enterprise service design center 194 is further

configured to receive service usage records for device 110, which is managed by enterprise service design center 194, from a device-based element that monitors and reports device 110 service usage (e.g., one or more device usage monitors 119, device service processor framework program 139, or service processor kernel program 138, network stack 134, or access modem 151), and when the usage limit is reached a service usage notification message is generated. In some embodiments, enterprise service design center 194 is configured to deliver the service usage notification message to enterprise service design center UI 196. In some embodiments, enterprise service design center 194 is configured to deliver the service usage notification message to a device 110 software application (e.g., service processor framework program 139 or user data app 111) for presentation to the device user via a user interface.

[00145] In some embodiments, enterprise service design center 194 is configured to receive or accept a specification for an access network service usage limit (e.g., a service amount in minutes, bytes, or cost) for a service usage activity (such as a data service, a voice service, a text service, a roaming service, or a more detailed classification of data service such as one or more websites or one or more device applications), and the service usage limit is applied to one or more devices 110 or device groups (or users or user groups) managed by enterprise service design center 194. In some embodiments, enterprise service design center 194 is further configured to receive service usage records for device 110, which is managed by the enterprise service design center 194, from a device-based element configured to monitor and report device 110 service usage (e.g., one or more device usage monitors 119, device service processor framework program 139 or service processor kernel program 138, network stack 134, or access modem 151), and when the usage limit is reached a restriction or limitation on further usage is applied by the service design center by provisioning one or more network elements responsible for enforcing network access policy (e.g., carrier gateway/home agent 152, carrier usage accounting server 154, enterprise firewall/security gateway 171). In some embodiments, enterprise service design center 194 is configured to send the user a notification message or a message to contact an enterprise manager.

[00146] In some embodiments, secure network interface 128 on device 110 is configured with a VPN device client function to securely communicate between one or more approved enterprise applications (e.g., enterprise data app 124, enterprise voice app 126, secure enterprise mobile

services app 125) and a counterpart VPN function that secures access to enterprise network 170 (e.g., enterprise firewall/security gateway 171 or server secure network interface 127). In some embodiments, a device software application or agent (e.g., service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) is configured to identify network access activity associated with individual applications and allow network access to one or more approved enterprise applications when a VPN device client function is in operation, or not allow network access to one or more approved enterprise applications when a VPN device client function is not in operation. In some embodiments, service design center 190 or enterprise service design center 194 is configured to provision a device 110 software application or agent (e.g., service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) with application access policy rules to identify network access activity associated with individual applications and allow network access to one or more approved enterprise applications when a VPN device client function is in operation, or not allow network access to one or more approved enterprise applications when a VPN device client function is not in operation. In this manner, enterprise applications that might be subject to spoofing by network elements, websites, servers, or programs operating outside the secure enterprise environment are not placed in communication with such network elements.

[00147] In some embodiments, a device software application or agent (e.g., service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) is configured to identify network access activity associated with individual applications and not allow network access to one or more non-approved applications when a VPN device client function is in operation, or allow network access to one or more non-approved applications when a VPN device client function is not in operation. In some embodiments, service design center 190 or enterprise service design center 194 is configured to provision a device 110 software application or agent (e.g., service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) with application access policy rules to identify network access activity associated with individual applications and not allow network access to one or more non-approved applications when a VPN device client function is in operation, or allow network access to one or more enterprise applications when a VPN device client function is not

in operation. In this manner, applications that might maliciously access enterprise network resources when the VPN is running are not permitted to do so.

[00148] In some embodiments, the application access policy rules are enforced by allowing or not allowing an application to access the network. In some embodiments, the application access policy rules are enforced by allowing or not allowing the application to run. In some embodiments, the identification of approved enterprise applications associated with traffic flows is confirmed or secured by identifying the application certificate and comparing it to an application signature or hash on the device. In some embodiments, the identity of an approved enterprise application is confirmed by inspecting an application certificate, signature or hash that is provided by service design center 190 or enterprise service design center 194.

[00149] In some embodiments, secure network interface 128 is configured with a split-tunnel VPN device client function, wherein an enterprise side of the split tunnel is configured to securely communicate between one or more enterprise applications (e.g., enterprise data app 124, enterprise voice app 126, secure enterprise mobile services app 125) and a counterpart VPN function that secures access to the enterprise network 170 (e.g., enterprise firewall/security gateway 171 or server secure network interface 127), and a consumer side of the split tunnel is configured to communicate without encryption for access network services provided to consumer applications on the device. In some embodiments, a device software application or agent (e.g. service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) is configured to identify network access activity associated with individual applications and route or direct traffic associated with one or more enterprise applications to the enterprise side of the split VPN tunnel, and route or direct traffic associated with one or more consumer applications to the consumer side of the VPN tunnel. In some embodiments, service design center 190 or enterprise service design center 194 is configured to provision a device 110 software application or agent (e.g., service processor framework program 139 or service processor kernel program 138, secure network interface 128, secure hardware partition manager 108) with application access policy rules to identify network access activity associated with individual applications and specify which applications are to be routed or directed to the enterprise side of the VPN tunnel and which applications are to be routed or directed to the consumer side of the VPN tunnel. In some

embodiments, the identification of applications associated with traffic flows is secured by identifying the application certificate and comparing it to an application signature or hash on the device. In some embodiments, the application certificate, signature or hash is provided by service design center 190 or enterprise service design center 194.

[00150] In some embodiments, the policy rules only enable secure applications on device 110 to access enterprise data. In some embodiments, an enterprise manager sets policy rules that do not allow secure applications on device 110 to upload data to unsecure destinations.

[00151] In some embodiments, service design center 190 is configured to provide enterprise service design center 194. In some embodiments, enterprise service design center 194 comprises a policy management system configured to select a set of access network policies to be enforced for one or more device groups (or user groups) where the set of access network policies consists of a subset of the full set of access network policies capable of being enforced by the access network policy enforcement elements. In some embodiments, the subset of the full set of policies capable of being enforced by the access network policy enforcement elements comprises a pre-defined subset of the policy configuration capabilities. In some embodiments, the enterprise service design center policy management subset limitations for enterprise service design center 194 provide the ability to define and manage one or more of the policies that define a service policy set or service plan that is applied to a given device, user, device group or user group. In some embodiments, the enterprise service design center policy management subset limitations for enterprise service design center 194 can provide the ability to enroll a device, user, device group or user group in a set limited to one or more pre-defined service policy configurations or service plans.

[00152] As an example embodiment, the enterprise service design center policy management subset limitations for enterprise service design center 194 may provide the following policy definition and management capabilities for a device (or user) or device group (or user group): specify service usage limits (caps) for bulk access service or for a specific classification of access service activities, require all traffic or certain traffic associated with enterprise-critical applications or content to be communicated via an enterprise VPN, define controls for which applications that can access the network or certain defined destinations on the network, specify

network destinations that are allowed or not allowed, specify roaming service limitations, specify WiFi networks that are allowed or not allowed, specify security settings in the device access control or I/O access control ports, specify service usage notification triggers and notification content associated with the triggers (e.g., warnings when a specified service usage activity occurs, access is not allowed for a given attempted service usage activity, or service usage reaches a limit), and other such examples that are allowed to be managed under the policy management subset limitations. In some embodiments, the charging rates for such services may not be allowed to be managed under the policy management subset limitations.

[00153] In some embodiments, enterprise service design center 194 has an allowable subset of the full set of policies capable of being enforced by the access network policy enforcement elements that comprises a pre-defined set of one or more access network policy configurations (e.g., service plans). As an example embodiment, the set of pre-configured service plans may be defined for a certain implementation of enterprise service design center 194 comprising multiple pre-defined service plans, each of which provides variations in one or more of service notification policy, access control policy, service classification policy, service QoS policy, or service charging policy.

[00154] In some embodiments, enterprise service design center 194 is configured to allow a service design administrator to select one or more pre-configured access network policy configurations (or service plans) to be applied to a device, a user, a device group or a user group.

[00155] In some embodiments, enterprise service design center 194 comprises a device enrollment management system configured to enroll a device credential into a device group (or a user credential into a user group), where the set of device credentials (or user credentials) that enterprise service design center 194 is capable of managing is a subset of the device credentials (or user credentials) allowed on the access network. In some embodiments, the subset of device credentials (or user credentials) that are subject to management by enterprise service design center 194 is defined using service design center 190.

[00156] As an example embodiment, the set of pre-defined service plans that are made available to a first enterprise service design center 194 implementation managed by a first enterprise entity might consist of three service plans, wherein the first service plan comprises

network policies (e.g., access policies, charging policies, or notification policies) that provide for limited or restricted home network access service but do not provide for roaming access services, the second service plan comprises network policies that provide for unlimited or unrestricted home network access service and also provide for limited roaming access services, and the third service plan comprises network policies that provide for unlimited or unrestricted home network access service and also provide for unlimited or unrestricted roaming access services. In another example embodiment, on the same carrier access network as the previous example, a second enterprise service design center 194 implementation managed by a second enterprise entity might consist of two service plans, wherein the two service plans might be the same as two of the service plans from the previous example embodiment, or they might be completely different.

[00157] Given these examples, it will now be understood and appreciated by one of ordinary skill in the art that enterprise service design center 194 provides a convenient means of designing and distributing custom service plans to different enterprise entities that meet the needs of each enterprise entity, wherein the various policy definition capabilities disclosed herein can be used in a large number of combinations to create the service plans, with the number of combinations of service plan design capabilities being too numerous to list here. It will also now be understood and appreciated by one of ordinary skill in the art that each enterprise can effectively manage its devices (or users) and device groups (or user groups) to provide the appropriate level of policy control needed by the enterprise in a simplified manner, without the need to manage all the full policy capabilities of the access network.

[00158] For example, the embodiments of service design center 190 and enterprise service design center 194 disclosed herein support a carrier network business process wherein a carrier network manager utilizes service design center 190 to create a set of access network policies that consist of a subset of the full set of access network policies capable of being enforced by the access network policy enforcement elements (referred to as specialized enterprise service plans), and the specialized enterprise service plans are designed and offered to meet the special needs of one or more enterprise entities. In some embodiments, an enterprise manager uses enterprise service design center 194 to apply the one or more specialized enterprise service plans to one or more devices (or users) or device groups (or user groups) that belong to the enterprise entity's mobile device inventory (or employee list). The different needs of various employee groups (or

device types) can be among the factors that determine which service plan is assigned to a given user group (or device group). The specific needs of an employee can assist in determining which user group (or device group) the employee should be assigned to. The carrier manager can also create other specialized enterprise service plans for other enterprise entities to meet varied needs among enterprise market customers.

[00159] In some embodiments, an enterprise manager controls access network usage, costs, and access limits for an employee user group (e.g., a group of devices that could be as small as a single device or as large as all devices under the enterprise manager's control). In some embodiments, the enterprise manager establishes at least two user groups and establishes and manages different network-access policies for different employee user groups. For example, the enterprise manager may set and manage different policies for data usage on WiFi, 3G, 4G, or other networks for different employee user groups. Likewise, the enterprise manager may set different roaming privileges for different employee user groups.

[00160] In some embodiments, an enterprise manager sets expenditure ceilings by limiting allowed data usage for secure business applications to enforce security rules. In some embodiments, an enterprise manager tracks enterprise data access to improve compliance records. For example, the enterprise manager can track enterprise data usage by employee, device, application, location, network, or time of day.

[00161]

Process Flows For Providing Enterprise And Consumer Billing Allocation For Wireless Communication Device Service Usage Activities

[00162] **Figure 27 i**llustrates a flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. At 402, the process begins. At 404, a service usage activity of a wireless communication device (e.g., application based service usage that uses a wireless network in which the wireless communication device has an associated service plan) is performed. In some embodiments, the monitoring is performed on the wireless communication device. In some embodiments, the monitoring is performed by a network element, such as a secure application

server for monitoring enterprise applications, as described herein with respect to various embodiments. At 406, an enterprise/consumer allocation is determined. In some embodiments, the monitored service usage activity is reported to a network element that determines the enterprise/consumer allocation based on the associated service plan that includes a defined enterprise/consumer allocation based on various factors, such as can be performed by a carrier billing server as described herein with respect to various embodiments. At 408, an associated consumer account is billed for the consumer service usage. At 410, the consumer account is credited for the enterprise service usage. At 412, the process is completed.

[00163] **Figure 28** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. At 502, the process begins. At 504, a service usage activity of a wireless communication device (e.g., application based service usage that uses a wireless network in which the wireless communication device has an associated service plan) is performed. At 506, an enterprise/consumer allocation is determined. At 508, an associated enterprise account is billed for the enterprise service usage. At 510, the enterprise account is credited for the consumer service usage. At 512, the process is completed.

[00164] **Figure 29** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. At 602, the process begins. At 604, a service usage activity of a wireless communication device (e.g., application based service usage that uses a wireless network in which the wireless communication device has an associated service plan) is performed. At 606, an enterprise/consumer allocation is determined. At 608, the enterprise service usage is reported. At 610, an expense reimbursement for the enterprise service usage is generated (e.g., by the enterprise for the consumer, who is, for example, an employee of the enterprise). At 612, the process is completed.

[00165] **Figure 30** illustrates another flow diagram for providing enterprise and consumer billing allocation for wireless communication device service usage activities in accordance with some embodiments. At 702, the process begins. At 704, a service usage activity of a wireless communication device (e.g., application based service usage that uses a wireless network in

which the wireless communication device has an associated service plan) is performed. At 706, the monitored service usage is reported. At 708, an enterprise/consumer allocation is determined. At 710, a bill/charge based on the enterprise/consumer allocation is generated. At 712, the process is completed.

[00166] Although the foregoing embodiments have been described in some detail for purposes of clarity of understanding, the invention is not limited to the details provided. There are many alternative ways of implementing the invention. The disclosed embodiments are illustrative and not restrictive. In particular, many of the embodiments are not limited to supporting an enterprise/consumer split. As would be appreciated by one of ordinary skill in the art, the disclosed embodiments may be applied, for example, when a sponsor entity subsidizes a cost associated with an end-user device's use of a sponsored (or ambient) data service or application, and the user pays for the end-user device's use of non-sponsored (or non-ambient) data services or applications. The sponsor entity may use enterprise service design center 194 to configure devices that may use the sponsored service, policies applicable to the sponsored service, etc. Moreover, the disclosed embodiments may be applied when a first sponsor subsidizes a cost associated with an end-user device's use of a first sponsored data service or application, a second sponsor subsidizes a cost associated with the end-user device's use of a second sponsored data service or application, and the user pays for the end-user device's use of non-sponsored data services or applications. The sponsor entities may use one or more enterprise service design centers to configure aspects of the sponsored services. As would be appreciated by one of ordinary skill in the art, there are many other environments in which the disclosed embodiments are useful or applicable.

[00167] Several advantageous combination embodiments are now disclosed for allocating enterprise service usage accounting and personal service usage accounting. These combinations are for example purposes, are not meant to be exhaustive or limiting in any way; as will be apparent to one of ordinary skill in the art, these combinations represent only a fraction of the embodiments provided herein.

[00168] In some embodiments, a network system for classifying the accounting of access network service usage for an end user device comprises (i) a first service design center

configured to receive an accounting split classification policy defining the classification rules for dividing an overall access network service usage into an enterprise service usage allocation and a personal service usage allocation, (ii) a network provisioning instruction translator configured to receive the accounting split classification policy and translate it to a set of network service usage classification and reporting instructions for one or more network elements responsible for classifying service usage, (iii) a network provisioning system for communicating the set of network service usage classification and reporting instructions to the one or more network elements responsible for classifying service usage, (iv) the one or more network elements responsible for classifying service usage configured to classify service usage to determine the enterprise service usage allocation and the personal service usage allocation, and generate service usage reports, and (v) a service usage accounting system that receives the service usage reports and (a) accrues the enterprise service usage allocation, and (b) accrues the personal service usage allocation.

[00169] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the first network access notification message policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials, and the service design center is further configured to obtain a second network access notification message policy comprising a plurality of second network access trigger conditions and, for each of the plurality of second network access trigger conditions, an associated second network access notification message, the second network access notification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials.

[00170] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device further comprises a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set. This embodiment can be further augmented wherein the master service design center is further configured to define a second notification policy design capability set for a second service design center, the second notification policy design capability set comprising a

second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

[00171] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device is further augmented wherein the first service design center is hosted on an operator network. In some embodiments, the network system for classifying the accounting of access network service usage for an end user device is optimized for smaller enterprise data center deployments wherein the first service design center is hosted on an enterprise business network.

[00172] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the enterprise service usage allocation comprises a classification of service usage that specifies one or more enterprise device software applications. In some embodiments, the enterprise applications can be one or more of email, calendar, contacts, enterprise intranet (e.g., a secure intranet browser with a secure SSL connection or other secure connection to enterprise services), mobile device synchronization or mobile enterprise communications.

[00173] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the enterprise service usage allocation comprises a classification of service usage that specifies one or more enterprise network destinations.

[00174] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the enterprise service usage allocation comprises a classification of service usage that specifies one or more enterprise network destinations and the one or more enterprise network destinations comprise an address or identifier for a secure enterprise gateway. In some embodiments, the enterprise gateway comprises a VPN server.

[00175] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the enterprise service

usage allocation comprises a classification of service usage that specifies one or more enterprise network destinations and the one or more enterprise network destinations comprise an address or identifier for one or more secure enterprise mobile services gateways or servers comprising one or more of an email server, a calendar server, a contacts server, an enterprise intranet access server, a mobile device synchronization services server or a mobile enterprise communication server.

[00176] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the one or more network elements responsible for classifying service usage and generating service usage reports comprises a service usage monitor located in a wireless operator network.

[00177] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the one or more network elements responsible for classifying service usage and generating service usage reports comprises a service usage monitor located in an enterprise access network.

[00178] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the one or more network elements responsible for classifying service usage and generating service usage reports comprises a service usage monitor located on a wireless device.

[00179] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is located in an enterprise network.

[00180] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is managed by an enterprise manager under the control of the entity that manages an enterprise business.

[00181] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is located in an operator network.

[00182] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is managed by an operator manager under the control of the entity that manages a network operator.

[00183] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is further configured to credit a user account with a service usage credit or monetary credit associated with the accrued enterprise service usage allocation.

[00184] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is further configured to debit a user account with a service usage debit or monetary cost associated with the accrued personal service usage allocation.

[00185] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is further configured to credit an enterprise account with a service usage credit or monetary credit associated with the accrued personal service usage allocation.

[00186] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented wherein the service usage accounting system is further configured to debit an enterprise account with a service usage debit or monetary cost associated with the accrued enterprise service usage allocation.

[00187] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device can be augmented by further configuring the service design center to: (i) receive a personal service plan offer comprising one or more service plans for personal network access services accounted to the personal service usage allocation, (ii) configure a device user interface service plan offer notification message, (iii) communicate the device user interface service plan offer notification message to one or more device groups comprising a collection of devices identified by device credentials, (iv) receive a service plan selection option from an end user device user in response to the device user interface service plan

offer notification message, and (v) cause one or more network elements responsible for activating service plans to activate the service plan selection chosen by the end user device user.

[00188] In some embodiments the end-user device system in communication with the network system for classifying the accounting of access network service usage comprises: (i) a device software application environment comprising: (a) an enterprise application execution environment configured with: (1) an enterprise application execution memory and data memory to support secure execution of enterprise software applications, the enterprise software applications comprising applications approved to execute in the secure execution environment and to communicate with secure enterprise services, (2) a secure enterprise communication link configured to provide communication between the enterprise software applications and enterprise network services, the enterprise network services comprising enterprise network resources and servers, (b) a personal application execution environment configured with execution memory and data memory to support execution of personal software applications not approved to execute in the secure execution environment, (ii) a personal service plan selection user interface comprising a notification software agent configured to receive personal service plan offer from a network element and display the service plan offers, the personal service plan offer comprising one or more service plans for personal network access services accounted to a personal service usage allocation, and receive a service plan selection option from an end user device user and forward the service plan selection option to a network element.

[00189] In some embodiments, the end-user device system can be augmented wherein the secure enterprise communication link comprises a VPN client in communication with an enterprise VPN gateway.

[00190] In some embodiments, the end-user device system can be augmented wherein the enterprise network services comprise access to one or more secure enterprise mobile services gateways or servers comprising one or more of an email server, a calendar server, a contacts server, an enterprise intranet access server, a mobile device synchronization services server or a mobile enterprise communication server.

[00191] In some embodiments, the end-user device system can be augmented wherein the enterprise application execution environment is further configured to: (i) acquire a device

software application signature prior to allowing execution of the device software application in the virtual machine operating environment, (ii) compare the signature to an approved list of signatures, (iii) allow the application to execute if it is on the list, and (iv) not allow the application to execute if it is not on the list.

[00192] In some embodiments, the end-user device system can be augmented wherein enterprise application execution environment comprises a virtual machine operating environment.

[00193] In some embodiments, the end-user device system can be augmented wherein enterprise application execution environment comprises a secure CPU hardware execution partition.

[00194] In some embodiments, the end-user device system can be augmented wherein enterprise application execution environment comprises a secure operating system execution partition.

[00195] In some embodiments, the end-user device system can be augmented wherein enterprise application execution environment comprises a secure memory area protected by an enterprise application software program that encrypts the enterprise data stored on device memory and runs a secure encrypted communication protocol for communication with a secure mobile enterprise services gateway server.

[00196] Several advantageous combination embodiments are now disclosed for providing enterprise control of network access service to an end user device. These combinations are for example purposes, are not meant to be exhaustive or limiting in any way; as would be appreciated by one of ordinary skill in the art, these combinations represent only a fraction of the advantageous embodiment combinations provided herein.

[00197] In some embodiments, a network system for providing network access service control for an end user device comprising: (i) a first service design center configured to receive from an administrator user or a configuration file a first network access policy comprising a first set of network access service permissions associated with an end user device or end user device user, (ii) a network provisioning instruction translator configured to receive the first network access

policy and translate it to a set of network access policy enforcement instructions for one or more network elements responsible for controlling network access, (iii) a network provisioning system for communicating the set of network access policy enforcement instructions to the one or more network elements responsible for controlling network access, (iv) the one or more network elements responsible for controlling network access configured to execute the set of network access policy enforcement instructions to enforce network access service permissions and limits.

[00198] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials, and the service design center is further configured to obtain a second network access policy comprising a second set of network access service permissions and, the second network access policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials.

[00199] In some embodiments, the network system for classifying the accounting of access network service usage for an end user device further comprises a master service design center configured to define a first network access policy design capability set for the first service design center, the first network access policy design capability set comprising a first subset of a master policy capability set. This embodiment can be further augmented wherein the master service design center is further configured to define a second network access policy design capability set for a second service design center, the second network access policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

[00200] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more service usage limits or service cost limits.

[00201] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more roaming network service usage limits or service cost limits.

[00202] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more network type restrictions, wherein a network type comprises one or more of a cellular network, a 2G network, a 3G network, a 4G network, a WiFi network, a particular WiFi network APN, roaming cellular network, a particular cellular operator network.

[00203] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more device application software network access restrictions.

[00204] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more network destination access restrictions.

[00205] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more enterprise network destination allowances or restrictions.

[00206] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more enterprise network destination allowances or restrictions communicated over a secure VPN communication link.

[00207] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more application or network destination allowances or restrictions communicated over a non-secure communication link.

[00208] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more personal application or network destination allowances or restrictions.

[00209] In some embodiments, the network system for providing network access service control can be augmented wherein the first network access policy defines a set of one or more geographic location allowances or restrictions.

[00210] In some embodiments, the network system for providing network access service control can be augmented wherein the one or more network elements responsible for controlling network access comprises a service usage monitor located in a wireless operator network.

[00211] In some embodiments, the network system for providing network access service control can be augmented wherein the one or more network elements responsible for controlling network access comprises a service usage monitor located in an enterprise access network. In some embodiments, the one or more network elements responsible for controlling network access comprises a service usage monitor located in an enterprise access network comprise a VPN gateway wherein all device traffic is communicated from the device to the VPN gateway configured to control the device traffic. In some embodiments, the VPN gateway performs service usage classification to identify and control enterprise traffic. In some embodiments, the VPN gateway performs service usage classification to identify and control personal traffic.

[00212] In some embodiments, the network system for providing network access service control can be augmented wherein the one or more network elements responsible for controlling network access comprises a service usage monitor located on a wireless device.

CLAIMS

1. A network system for providing network access service notification messages containing information about a network access activity of an end-user device, the network system comprising:

a first service design center configured to:

obtain a first network access notification message policy comprising a first network access trigger condition and an associated first network access notification message, the first network access trigger condition comprising one or more current or requested end-user device network access activities, the first network access notification message comprising notification information to be presented to a user through a user interface,

receive a trigger condition indication from a network element,

associate the trigger condition indication with the first network access notification message, and

present the notification information to the user through the user interface;

a network provisioning instruction translator configured to:

receive, from the first service design center, the first network access trigger condition, and

determine, based on the first network access trigger condition, one or more network access trigger identification instructions; and

a network provisioning system configured to communicate the one or more network access trigger identification instructions to one or more network elements responsible for monitoring the service usage, the one or more network elements responsible for monitoring the service usage configured to:

execute the one or more network access trigger identification instructions to identify when the first network access trigger condition occurs, and

send the trigger condition indication to the first service design center.

2. The network system recited in claim 1, further comprising a master service design center configured to define a first notification policy design capability set for the first service design center, the first notification policy design capability set comprising a first subset of a master policy capability set.

3. The network system of claim 2, wherein the master service design center is further configured to define a second notification policy design capability set for a second service design center, the second notification policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

4. The network system recited in claim 1, wherein the first network access trigger condition comprises a period of time since a previous network access trigger condition, and the first network access notification message comprises a real-time or near-real-time measure of an amount of service usage or a cost of service usage.

5. The network system recited in claim 1, wherein the first network access trigger condition comprises an amount of service usage or a cost of service usage, and the first network access notification message comprises a real-time or near-real-time measure of an aggregate service usage or an aggregate cost.

6. The network system recited in claim 1, wherein the service design center is further configured to send a user notification message to a user of the end-user device based on the first network access notification message.

7. The network system recited in claim 1, wherein the first service design center is hosted on an operator network.

8. The network system recited in claim 1, wherein the first service design center is hosted on an enterprise network.

9. The network system recited in claim 1, wherein the first network access trigger condition comprises a service usage limit or a specified amount of accrued cost.

10. The network system recited in claim 1, wherein the first network access trigger condition comprises a roaming service usage limit or specified amount of accrued roaming service cost.

11. The network system recited in claim 1, wherein the one or more network elements responsible for monitoring the service usage are configured to classify service usage by device application, and the first network access trigger condition comprises one or more device application access activities.

12. The network system recited in claim 1, wherein the one or more network elements responsible for monitoring service usage are configured to classify service usage by network destination, and the first network access trigger condition comprises one or more device network destination access activities.

13. The network system recited in claim 1, wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in a wireless operator network.

14. The network system recited in claim 1, wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located in an enterprise access network.

15. The network system recited in claim 1, wherein the one or more network elements responsible for monitoring service usage comprise a service usage monitor located on a wireless device.

16. The network system recited in claim 1, wherein the first network access notification message policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials, and the service design center is further configured to obtain a second network access notification message policy comprising a plurality of second network access trigger conditions and, for each of the plurality of second network access trigger conditions, an associated second network access notification message, the second network access notification message policy associated with a second device group

defined by a second list of device credentials or a second user group defined by a second list of user credentials.

17. The network system recited in claim 16, wherein the first network access notification message policy comprises a subset of the second network access notification message policy.

18. A network system for classifying an accounting of access network service usage by an end-user device, the network system comprising:

a first service design center configured to:

obtain a first accounting split classification policy defining classification rules for dividing an overall access network service usage into an enterprise service usage allocation and a personal service usage allocation;

a network provisioning instruction translator configured to:

receive the first accounting split classification policy from the first service design center, and

determine, based on the first accounting split classification policy, one or more network service usage classification and reporting instructions;

a network provisioning system configured to communicate the one or more network service usage classification and reporting instructions to one or more network elements responsible for classifying the service usage, the one or more network elements responsible for classifying the service usage configured to:

execute the one or more network service usage classification and reporting instructions to determine the enterprise service usage allocation and the personal service usage allocation, and

generate a service usage report; and

a service usage accounting system configured to receive the service usage report and, based on the usage report, accrue the enterprise service usage allocation and accrue the personal service usage allocation.

19. The network system as recited in claim 18, further comprising a master service design center configured to define a first accounting policy design capability set for the first service

design center, the first accounting policy design capability set comprising a first subset of a master policy capability set.

20. The network system of claim 19, wherein the master service design center is further configured to define a second accounting policy design capability set for a second service design center, the second accounting policy design capability set comprising a second subset of the master policy capability set, the second subset of the master policy capability set either identical to or different from the first subset of the master policy capability set.

21. The network system recited in claim 1, wherein the first accounting split classification policy is associated with a first device group defined by a first list of device credentials or a first user group defined by a first list of user credentials, and the service design center is further configured to obtain a second accounting split classification policy, the second accounting split classification message policy associated with a second device group defined by a second list of device credentials or a second user group defined by a second list of user credentials.

22. The network system recited in claim 21, wherein the first accounting split classification policy comprises a subset of the second accounting split classification policy.

23. A communications device comprising:

a secure enterprise application execution environment comprising:

memory configured to support secure execution of an enterprise software application, the enterprise software application approved by an enterprise to execute in the secure enterprise application execution environment and to access one or more secure enterprise services, and

a secure enterprise communication link configured to provide communication between the enterprise software application and one or more network resources and servers associated with at least one of the one or more secure enterprise services, and

a personal application execution environment comprising memory to support execution of personal software applications not approved by the enterprise to execute in the secure enterprise application execution environment or to access the one or more secure enterprise services; and

one or more device agents configured to:

receive a personal service plan offer from a network element, the personal service plan offer comprising one or more service plans to enable the communications device to access available network services accounted to a personal service usage allocation,

present the personal service plan offer to a user of the communications device through a user interface of the communications device,

obtain a user response to the personal service plan offer through the user interface of the communications device, and

send the user response to the network element.

24. A network system for providing network access service control for an end-user device, the network system comprising:

a first service design center configured to obtain a first network access policy comprising one or more network access service permissions associated with the end-user device or a user of the end-user device;

a network provisioning instruction translator configured to:

receive, from the first service design center, the first network access policy, and

determine, based on the first network access policy, one or more network access policy enforcement instructions; and

a network provisioning system configured to communicate the one or more network access policy enforcement instructions to one or more network elements responsible for controlling network access, the one or more network elements responsible for controlling the service usage configured to:

execute the one or more network access policy enforcement instructions to enforce network access service permissions and limits.

25. The network system recited in claim 24, further comprising a master service design center configured to define a first control policy design capability set for the first service design center, the first control policy design capability set comprising a first subset of a master policy capability set.

ABSTRACT OF THE DISCLOSURE

Enterprise and consumer billing allocation for wireless communication device service usage activities is provided. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device, and determining an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes monitoring a service usage activity of a wireless communication device, and reporting the monitored service usage activity to a network element, in which the network element determines an enterprise and consumer billing allocation for the monitored service usage activity. In some embodiments, enterprise and consumer billing allocation for wireless communication device service usage activities includes providing a service design center for configuring an enterprise and consumer billing allocation of monitored service usage activities for a plurality of wireless communication devices associated with an enterprise account, and implementing the configured enterprise and consumer billing allocation for monitored service usage activities for the plurality of wireless communication devices associated with the enterprise account.

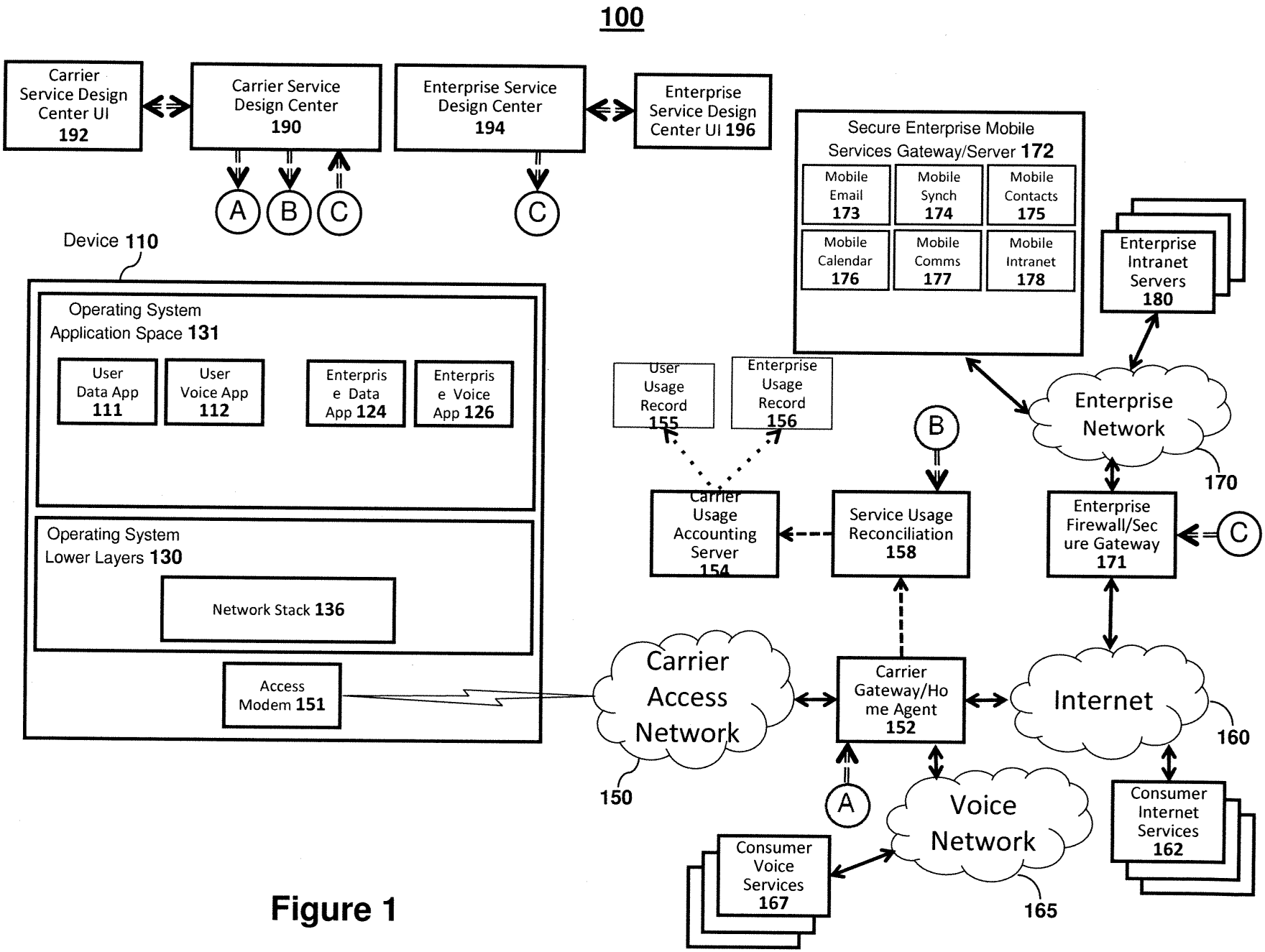

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Carrier Service Design Center 190
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Enterprise Firewall/Secure Gateway 171
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Carrier Gateway/Home Agent 152
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Consumer Voice Services 167
Consumer Internet Services 162

Figure 1

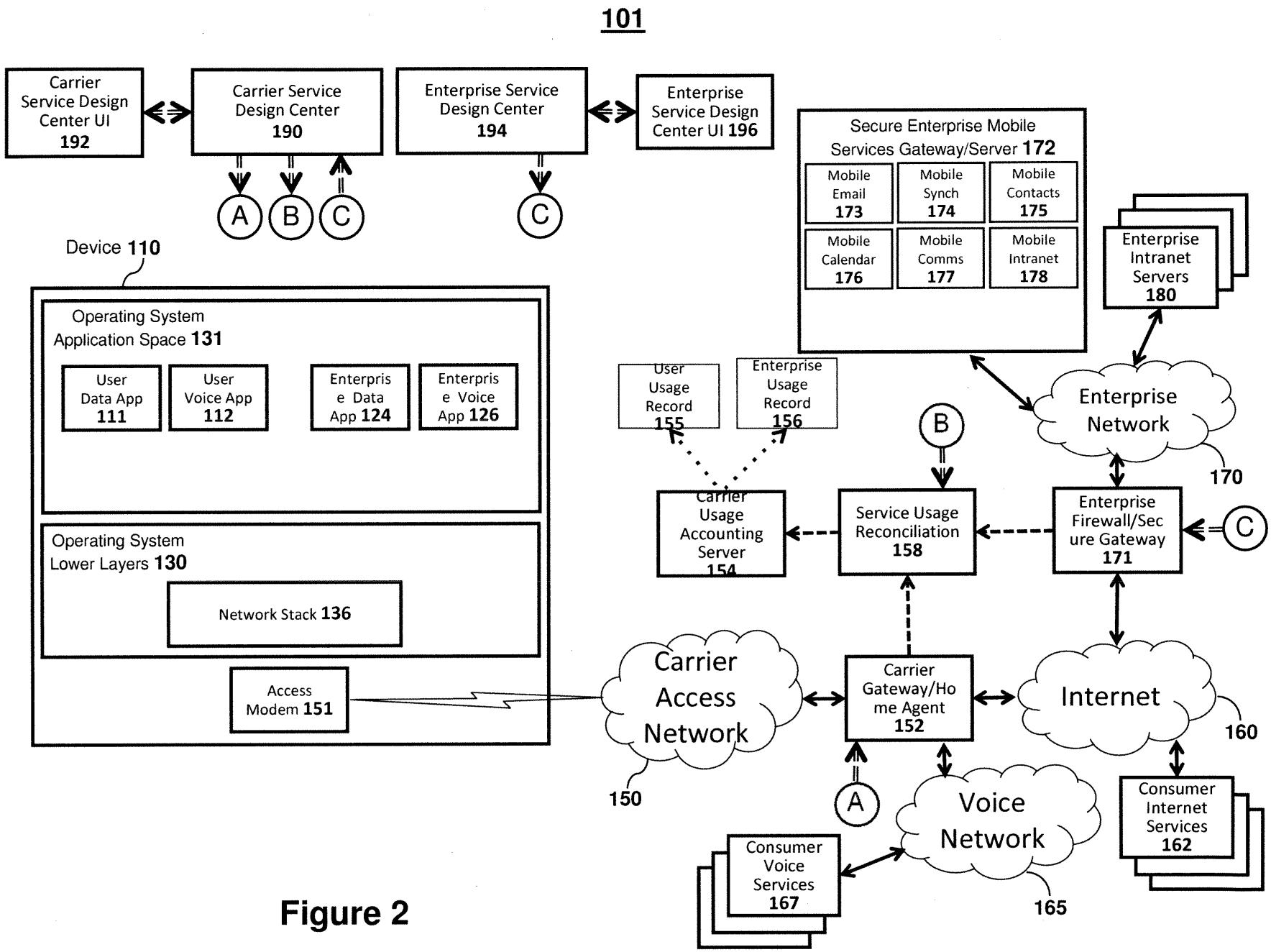

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Operating System Application Space 131
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Enterprise Voice App 126
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Consumer Voice Services 167
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Figure 2

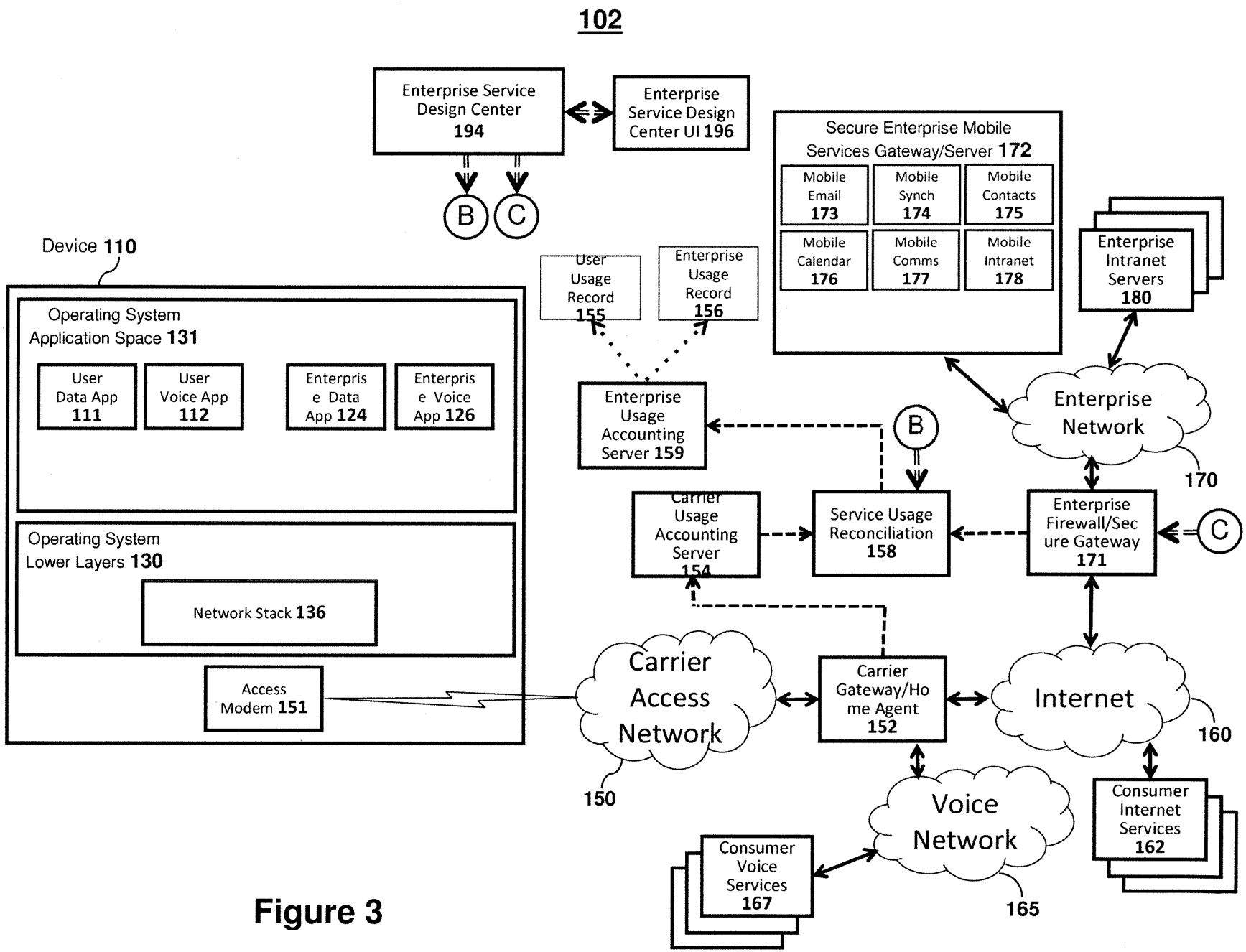

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Mobile Comms 177
Mobile Intranet 178
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Enterprise Usage Record 156
Operating System Application Space 131
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User Voice App 112
Enterprise Data App 124
Enterprise Voice App 126
Enterprise Usage Accounting Server 159
Enterprise Network 170
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Network Stack 136
Carrier Usage Accounting Server 154
Service Usage Reconciliation 158
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Carrier Gateway/Home Agent 152
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Voice Network 165
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Figure 3

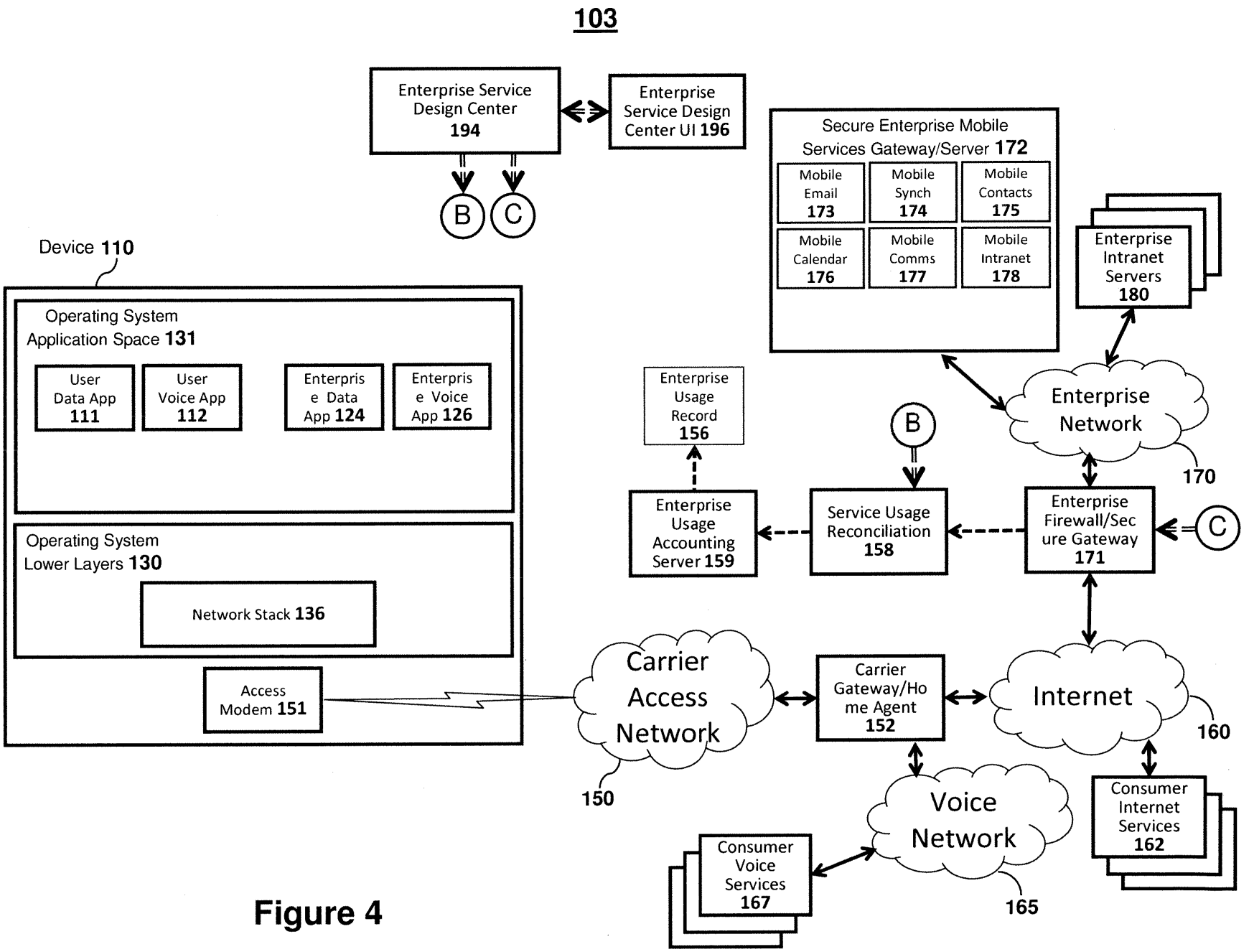

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Mobile Comms 177
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Figure 4

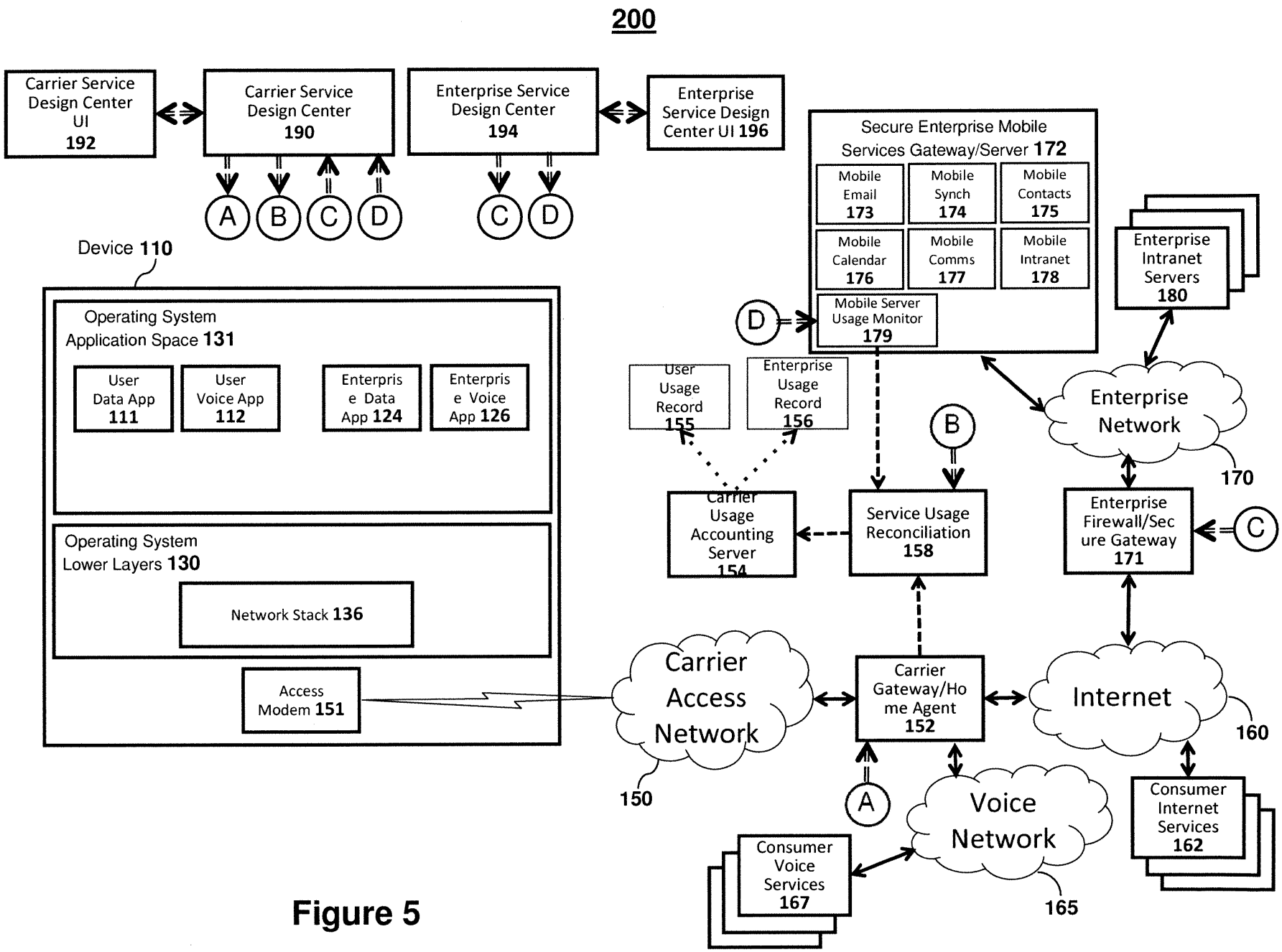

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Enterprise Service Design Center UI 196
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Operating System Application Space 131
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User Voice App 112
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Enterprise Usage Record 156
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Figure 5

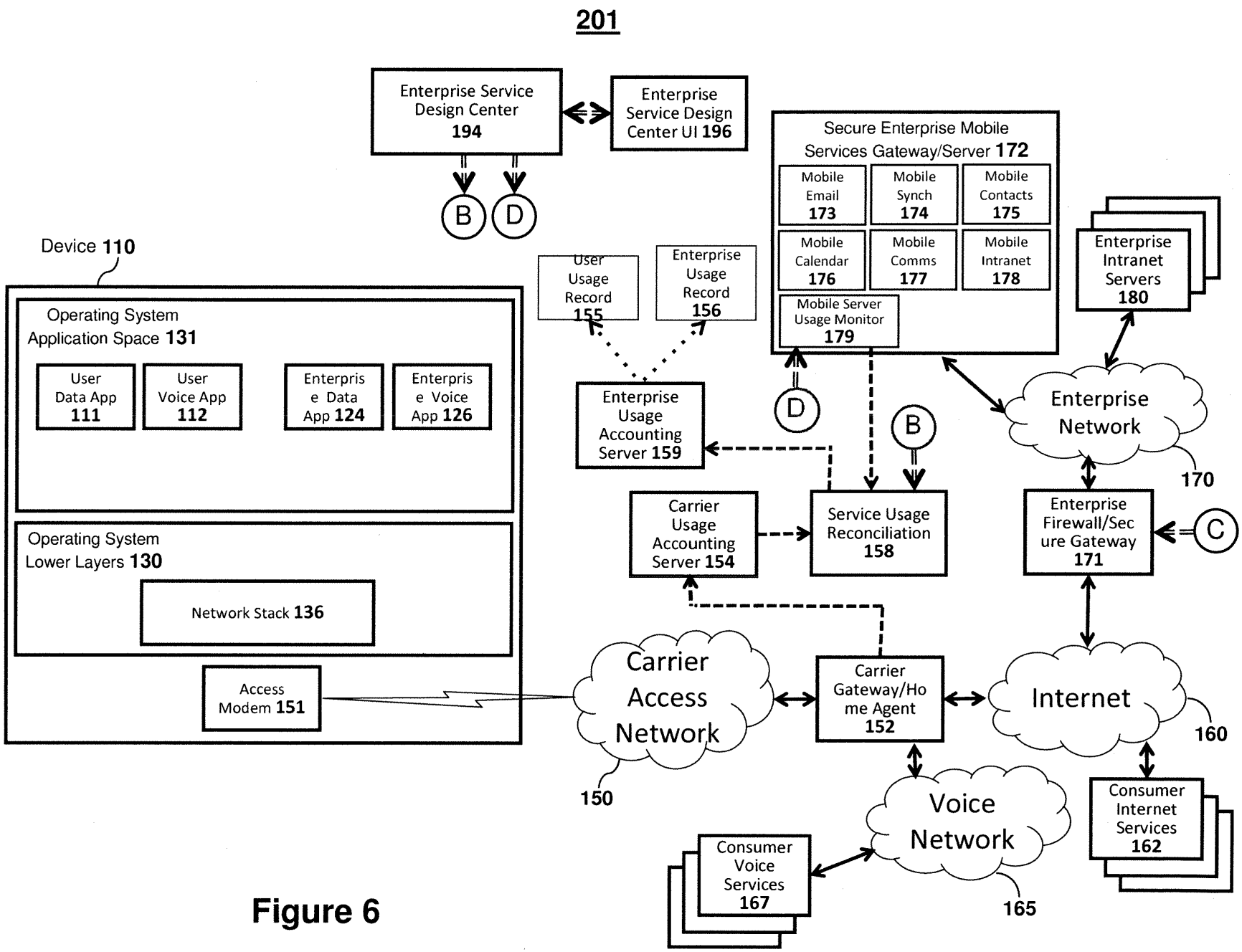

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Consumer Voice Services 167
Consumer Internet Services 162

Figure 6

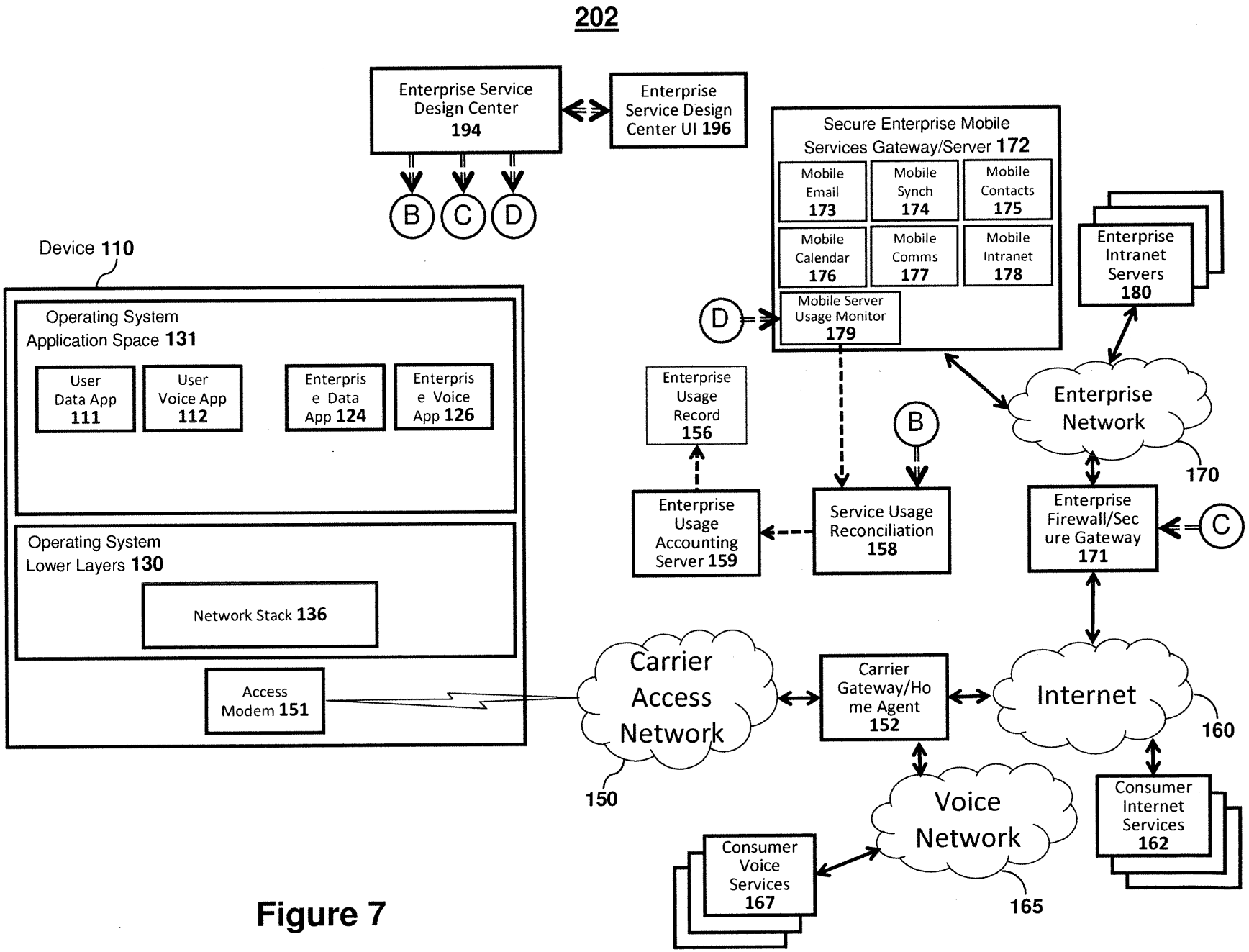

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Figure 7

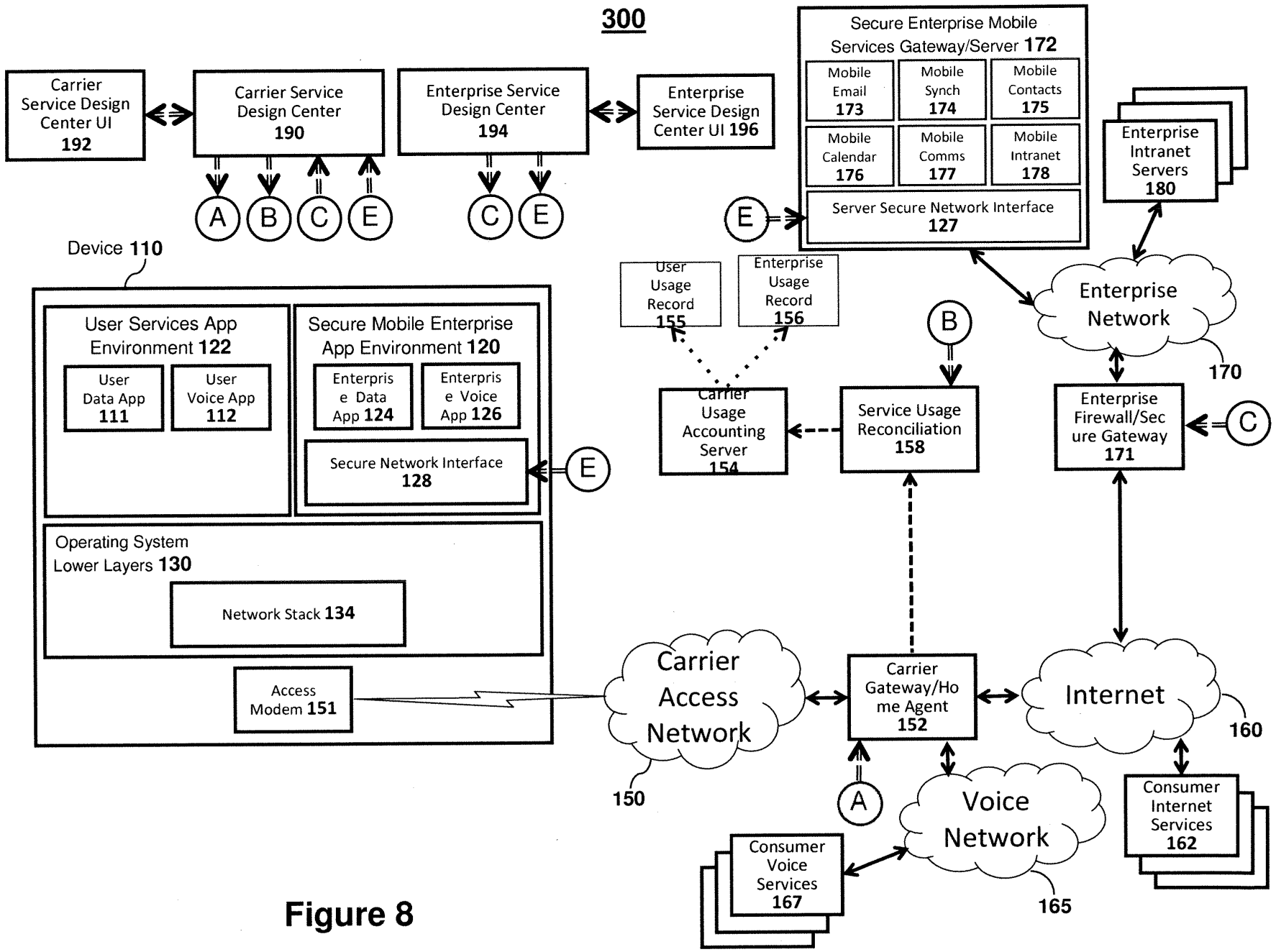

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Mobile Contacts 175
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Figure 8

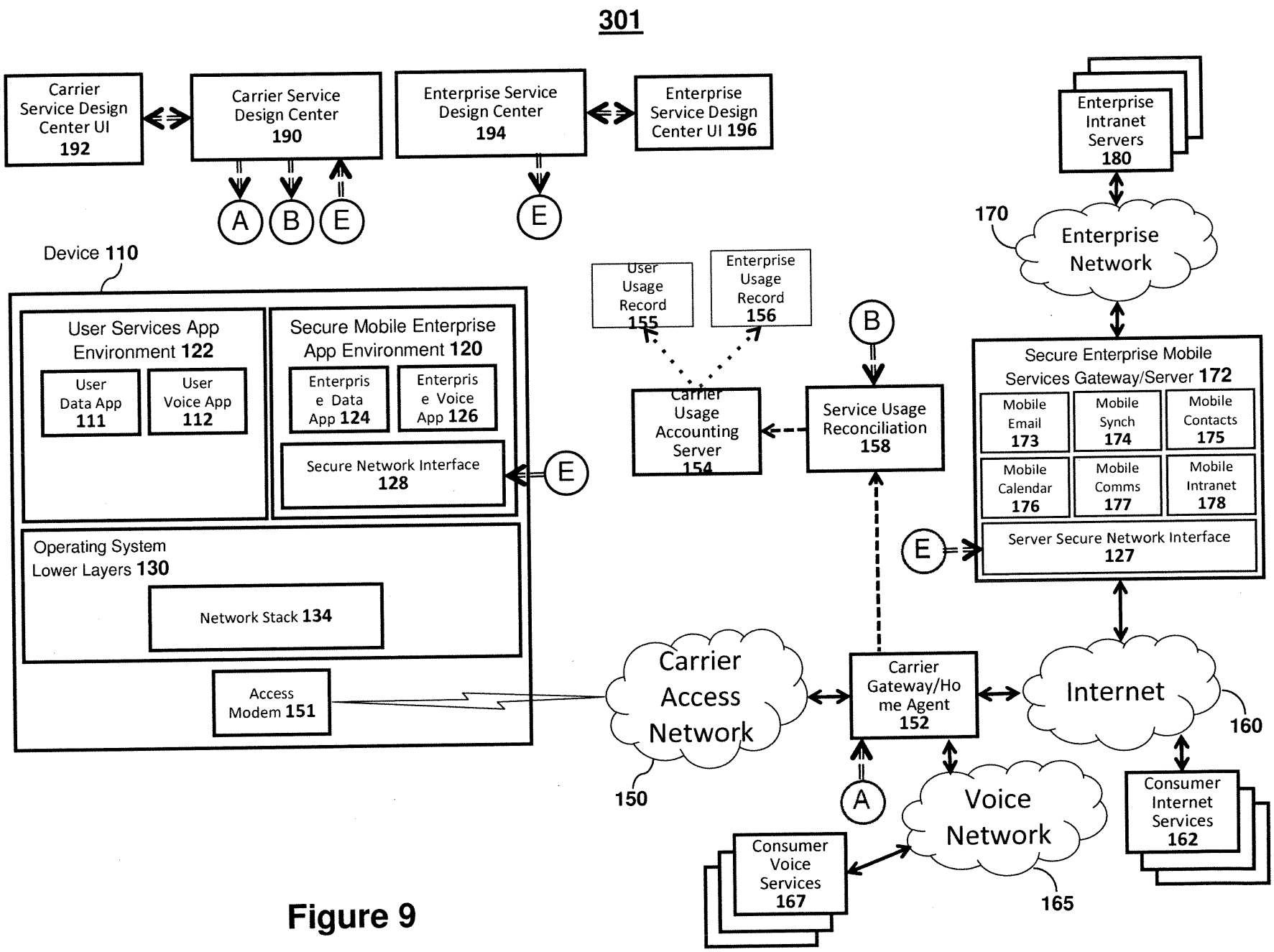

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Figure 9

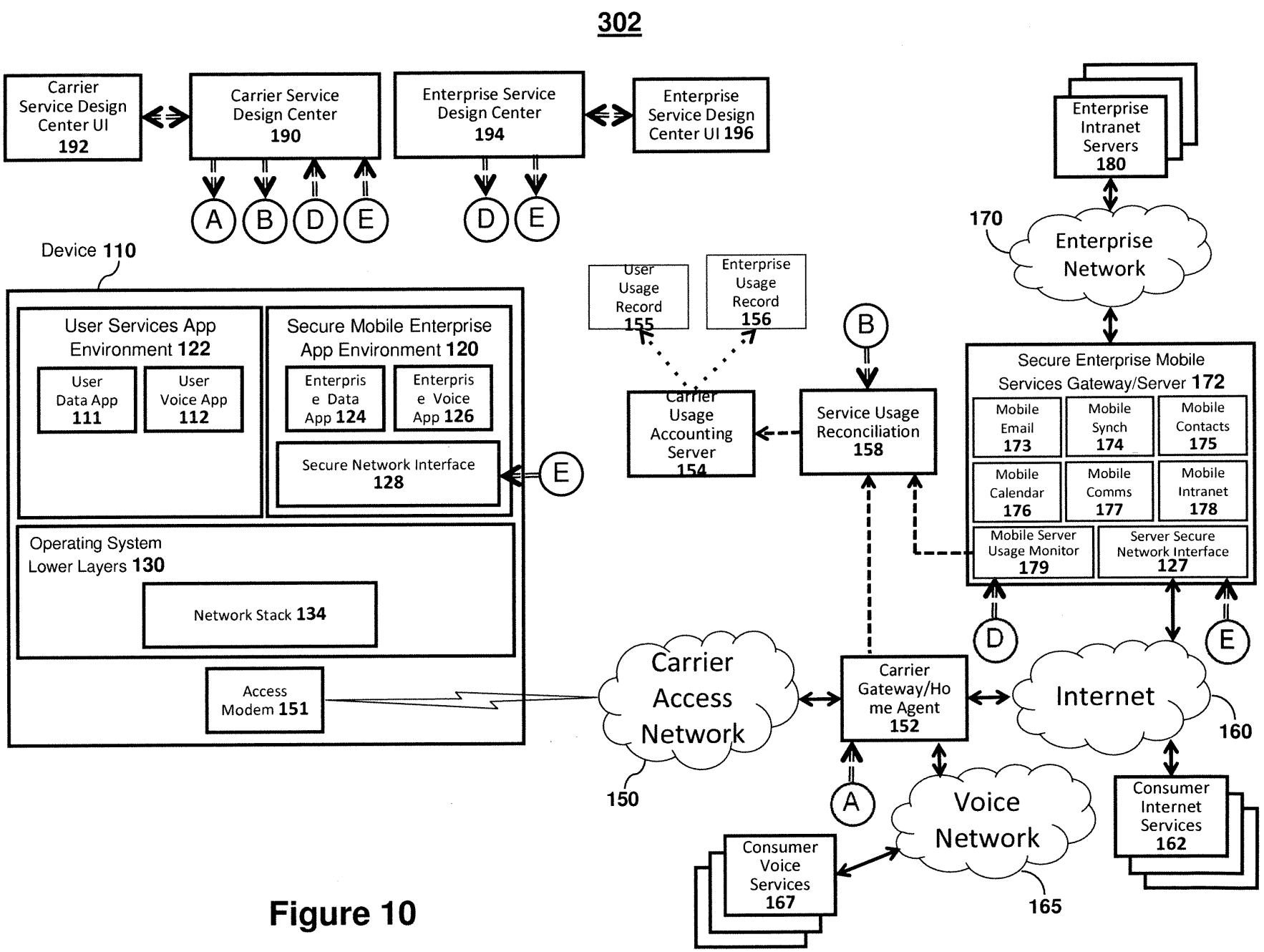

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Figure 10

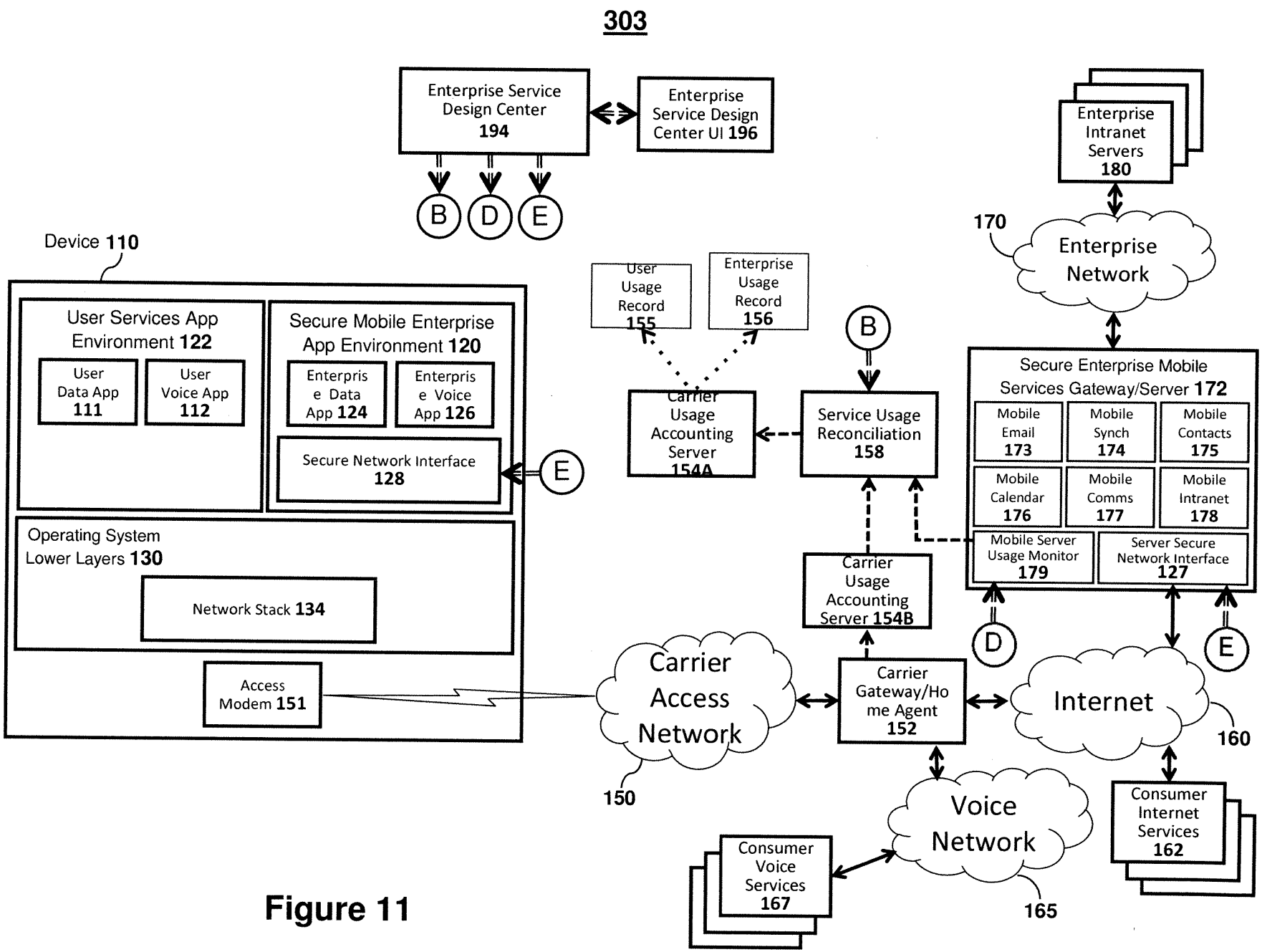

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Figure 11

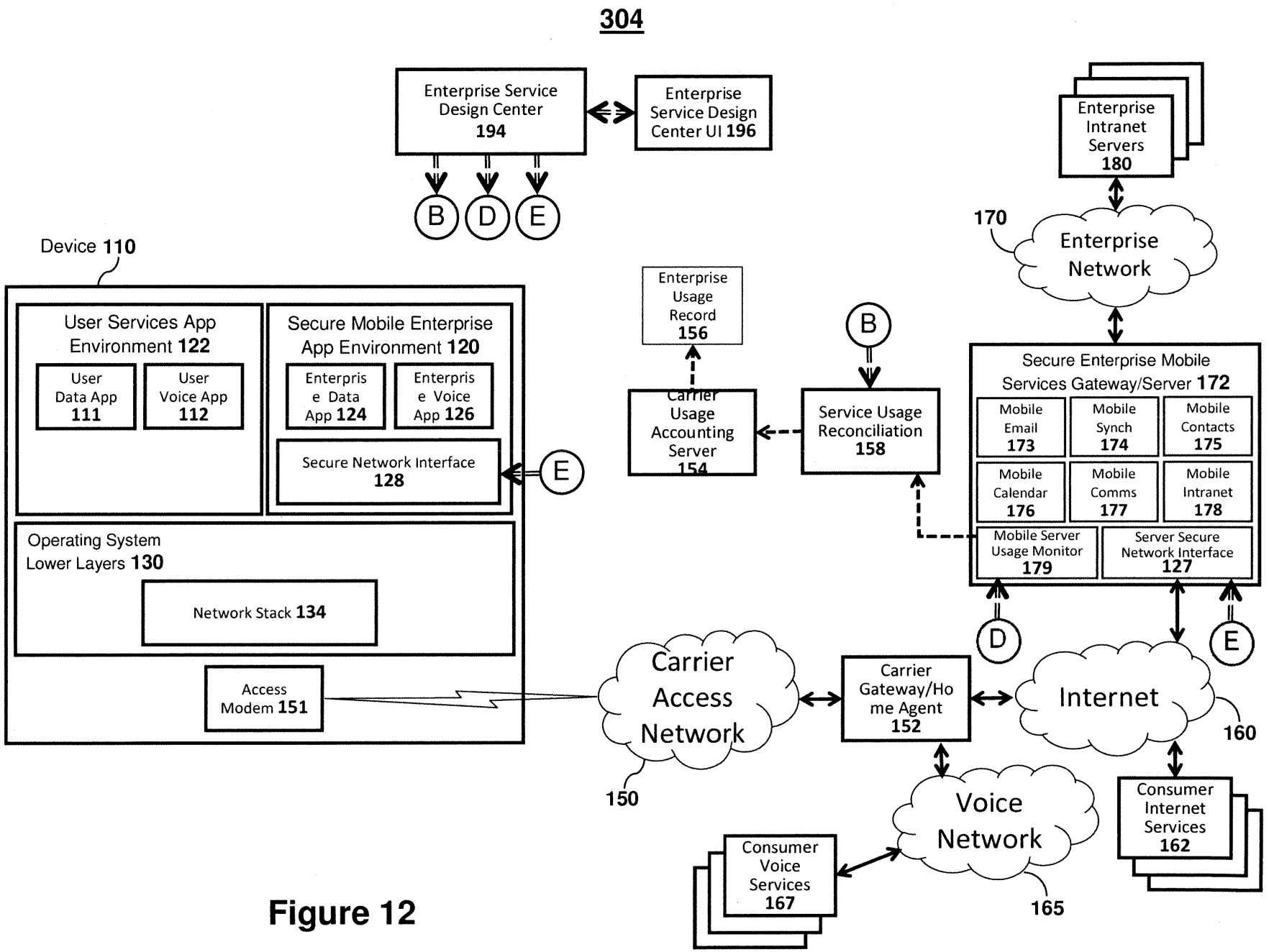

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Figure 12

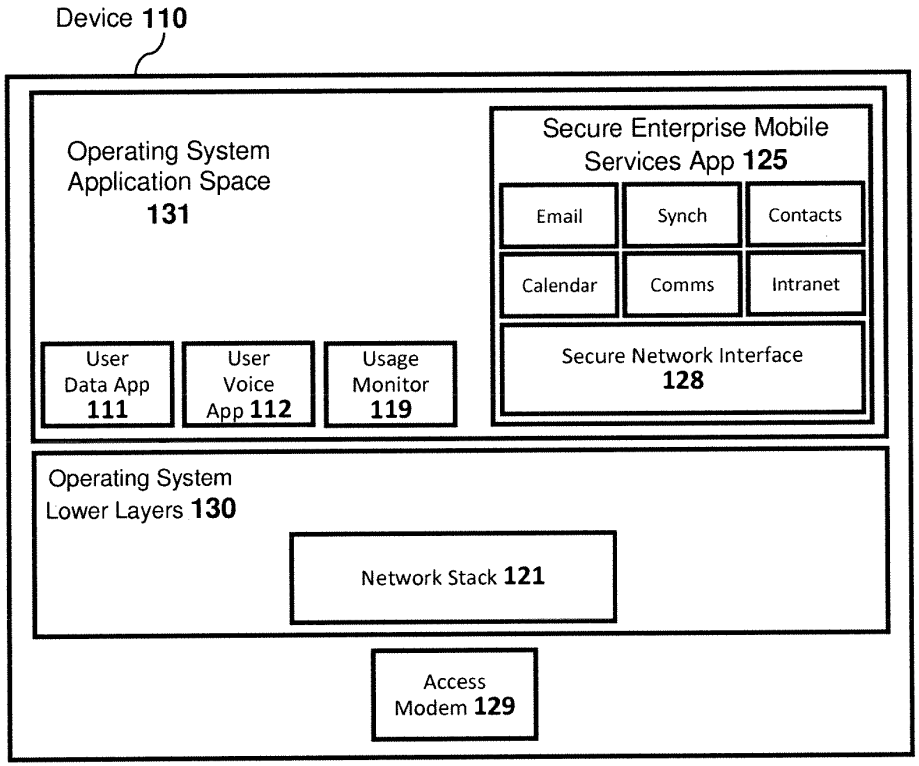

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Figure 13

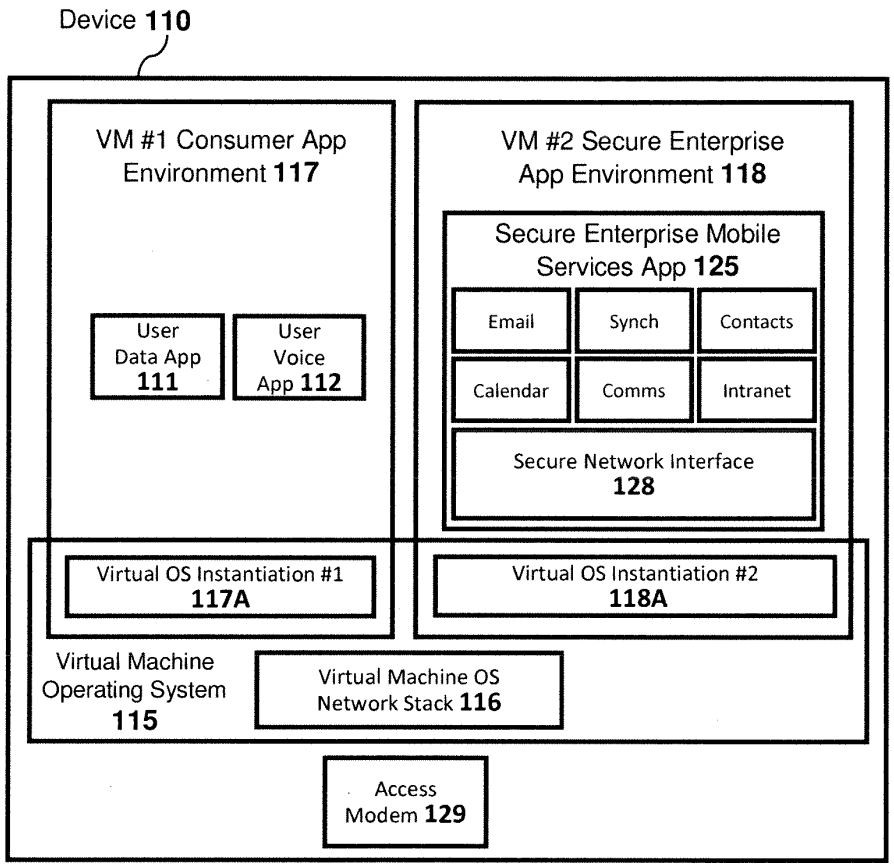

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Contacts
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Virtual Machine OS Network Stack 116
Access Modem 129

Figure 14

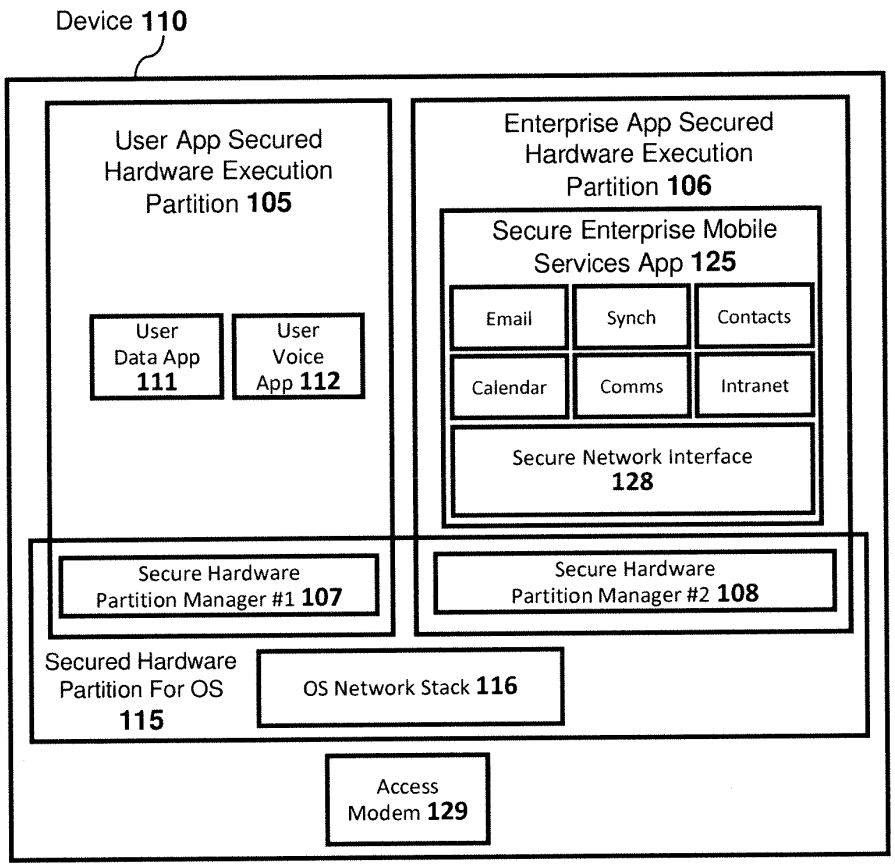

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Intranet
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Secure Hardware Partition Manager #2 108
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OS Network Stack 116
Access Modem 129

Figure 15

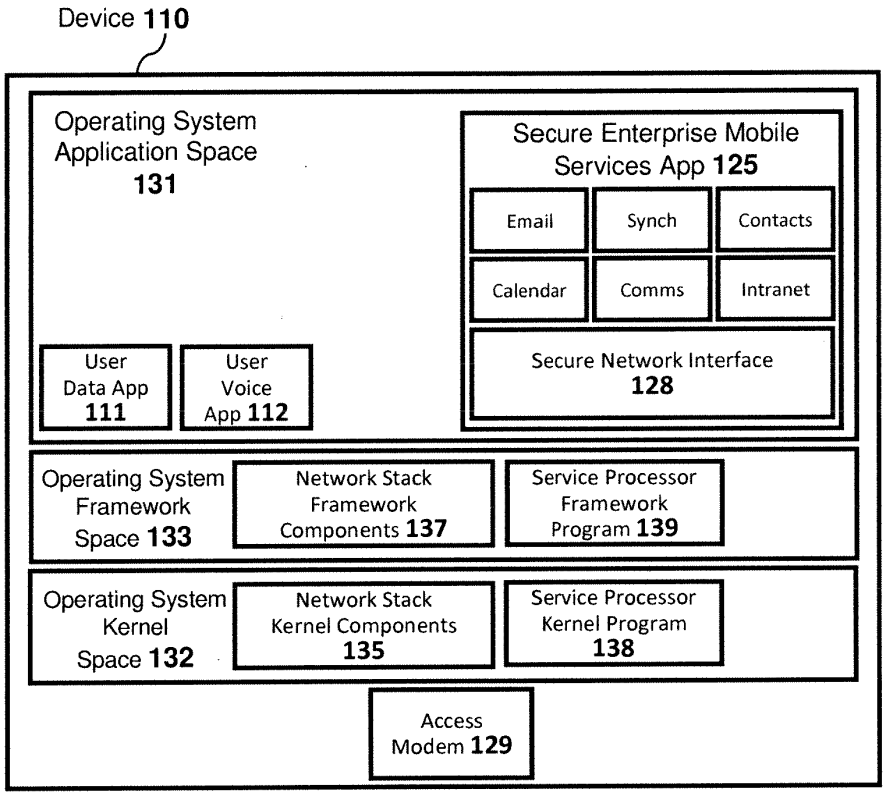

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Comms
Intranet
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User Voice App 112
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Service Processor Framework Program 139
Operating System Kernel Space 132
Network Stack Kernel Components 135
Service Processor Kernel Program 138
Access Modem 129

Figure 16

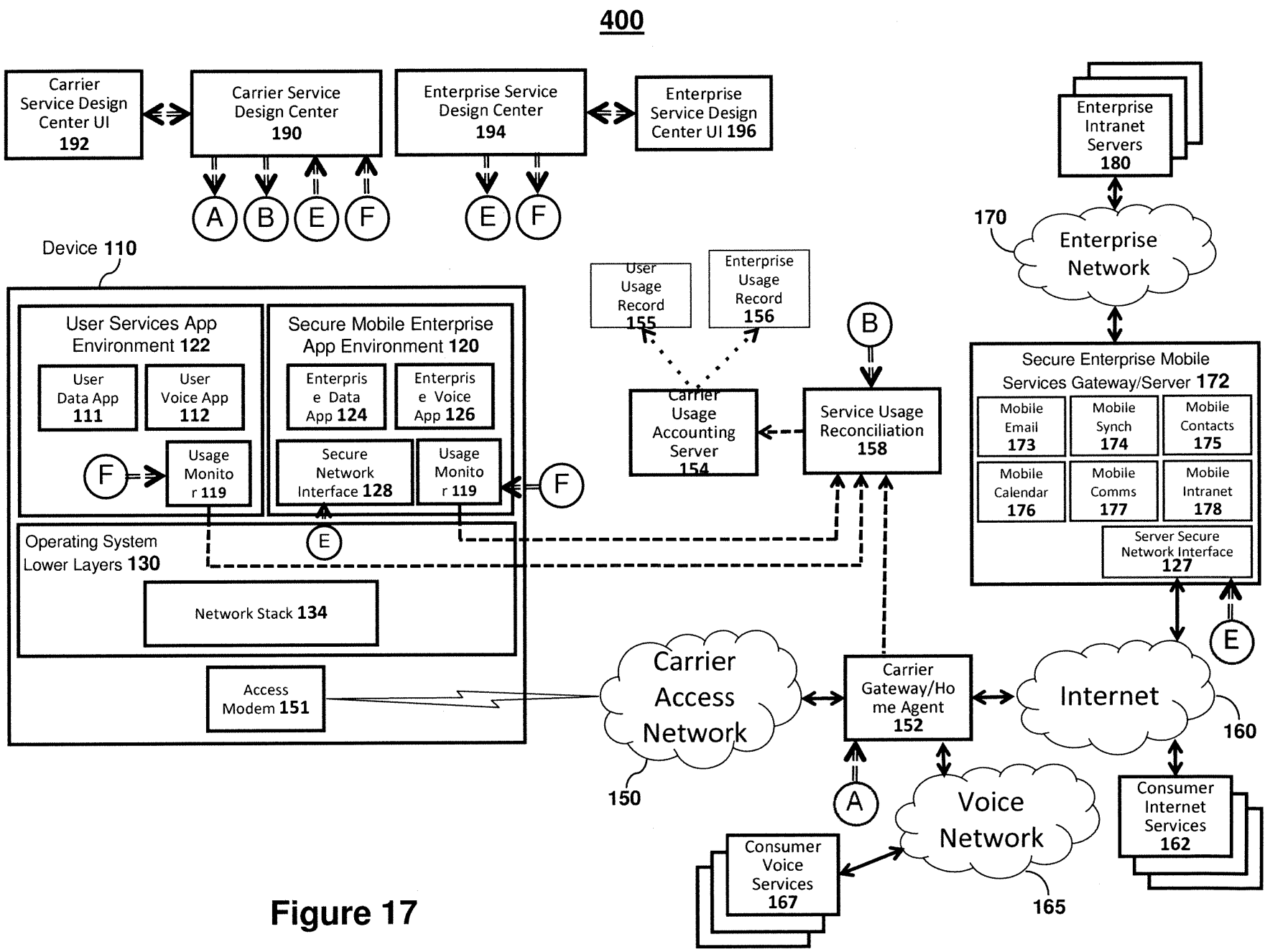

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Consumer Voice Services 167
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Figure 17

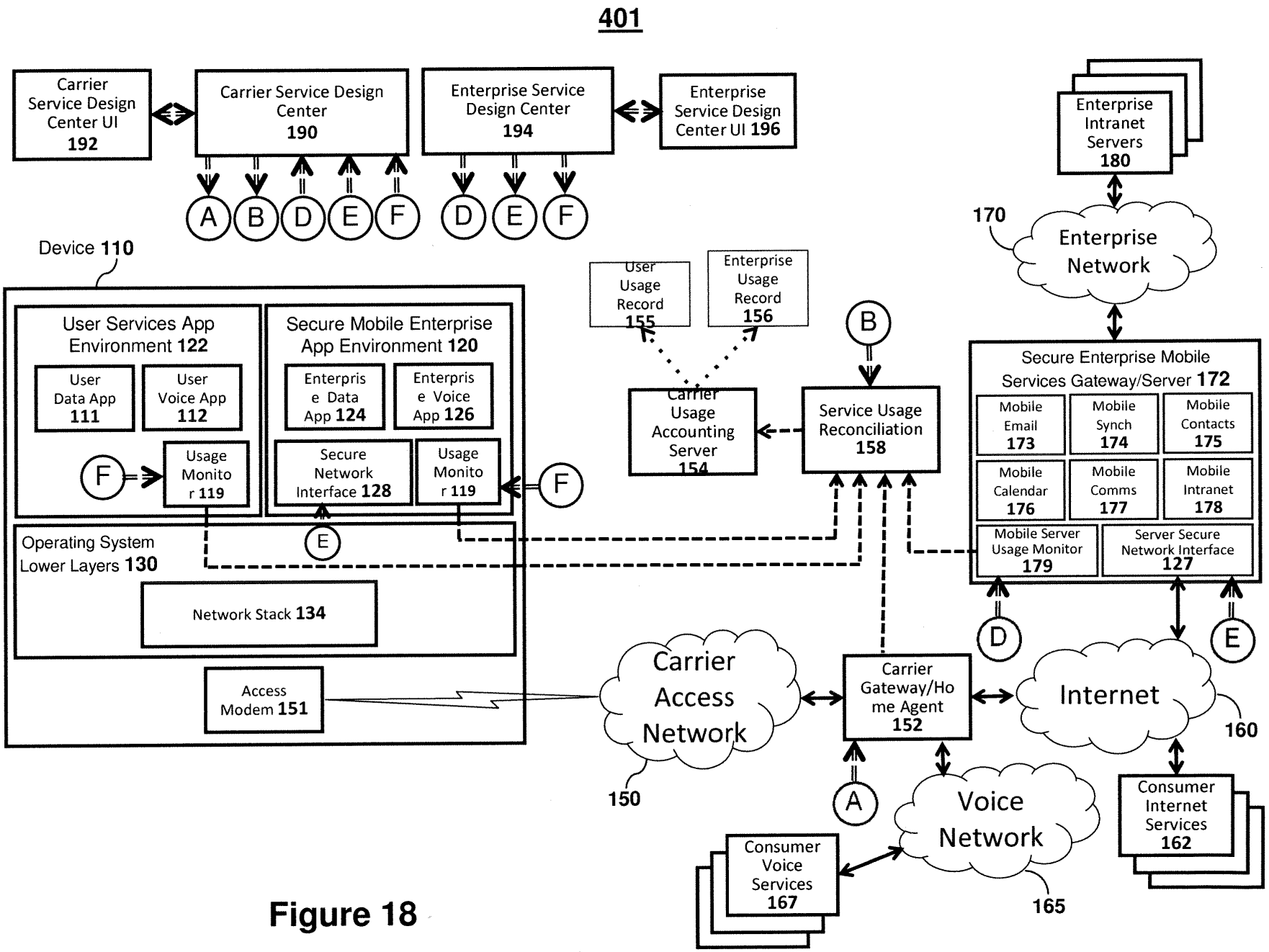

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Consumer Internet Services 162

Figure 18

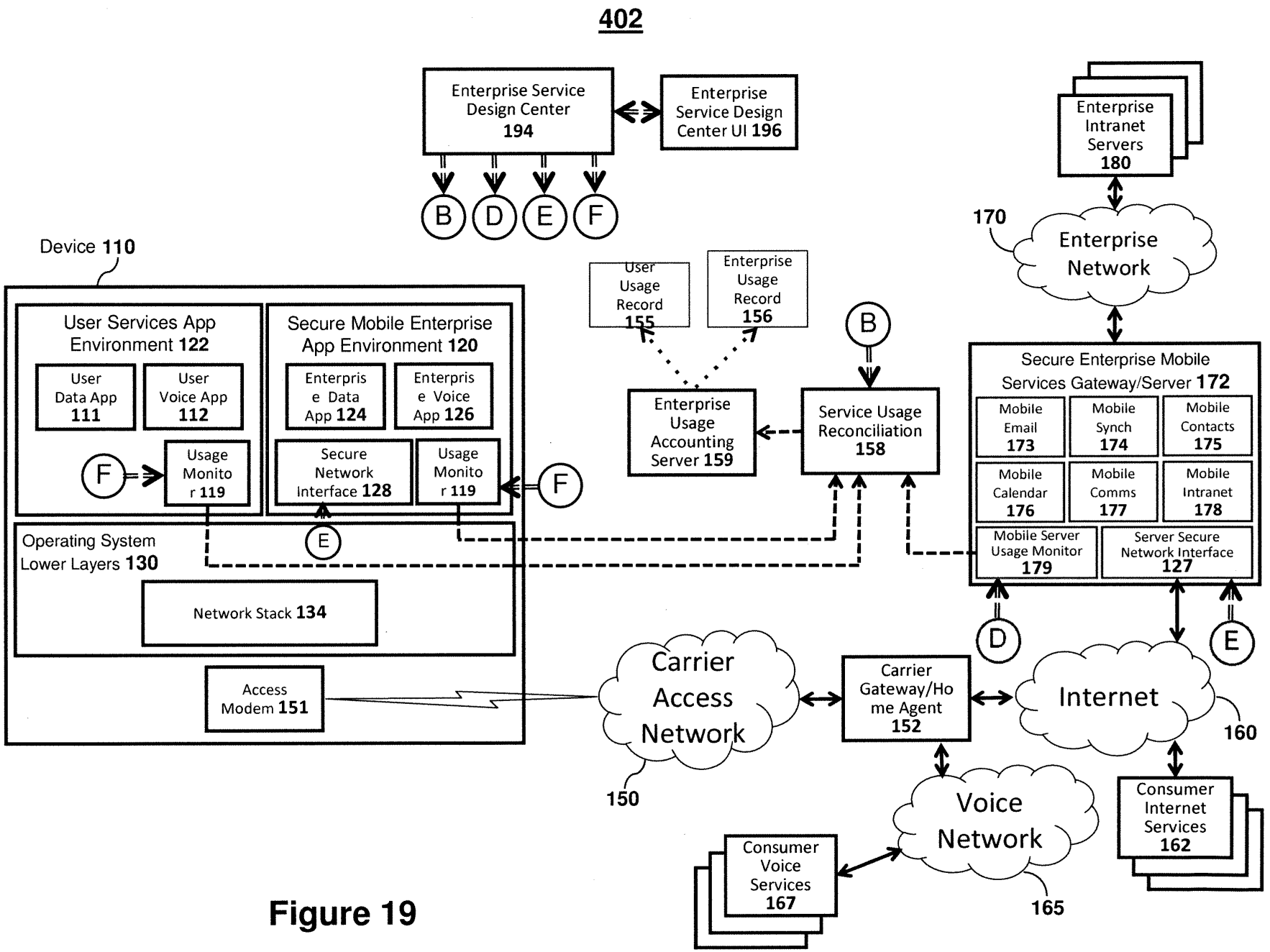

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Secure Mobile Enterprise App Environment 120
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Enterpris e Voice App 126
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Figure 19

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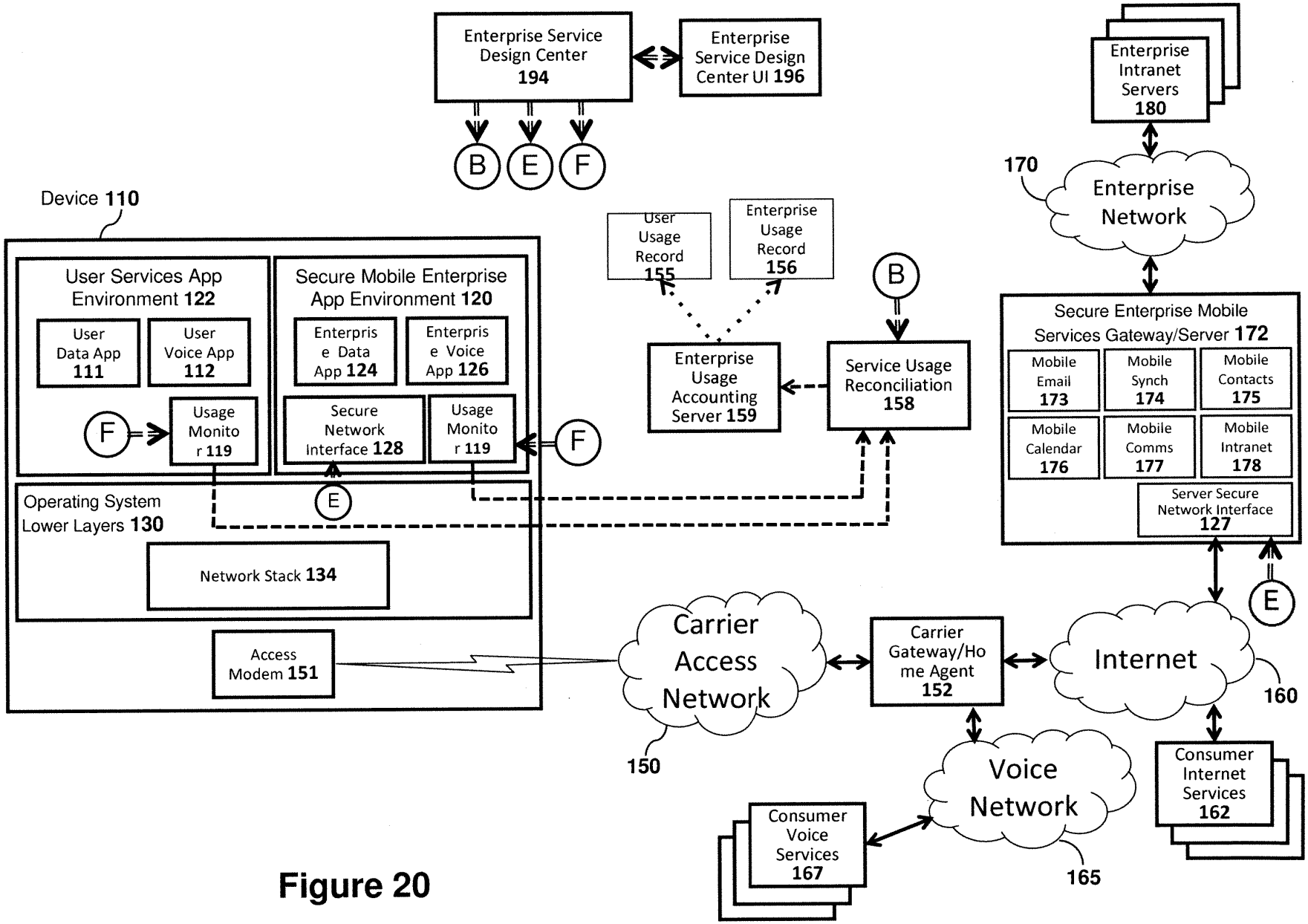


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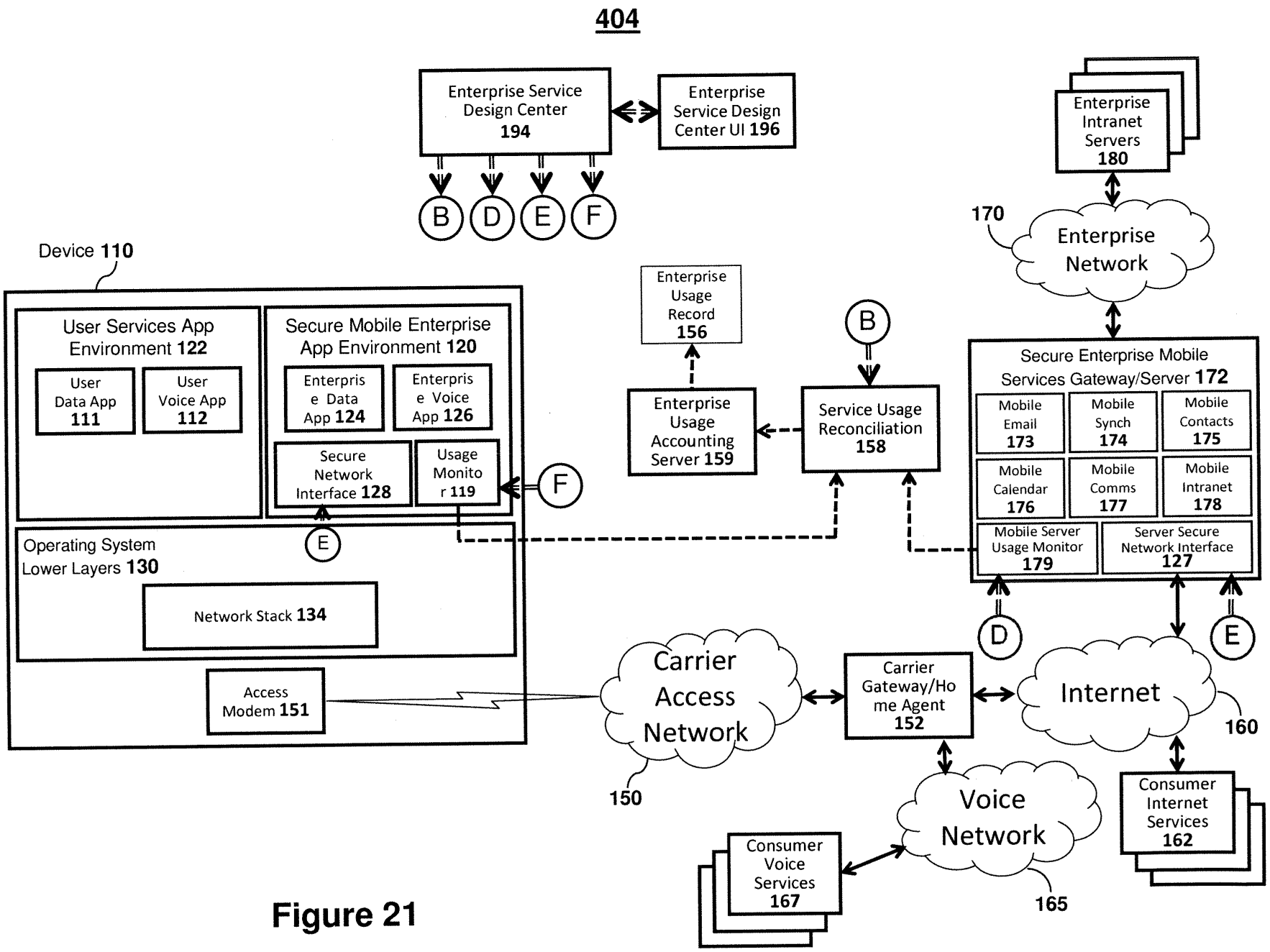

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Enterprise Service Design Center UI 196
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Enterprise Network
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Figure 21

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Consumer Voice Services 167
Consumer Internet Services 162

Figure 22

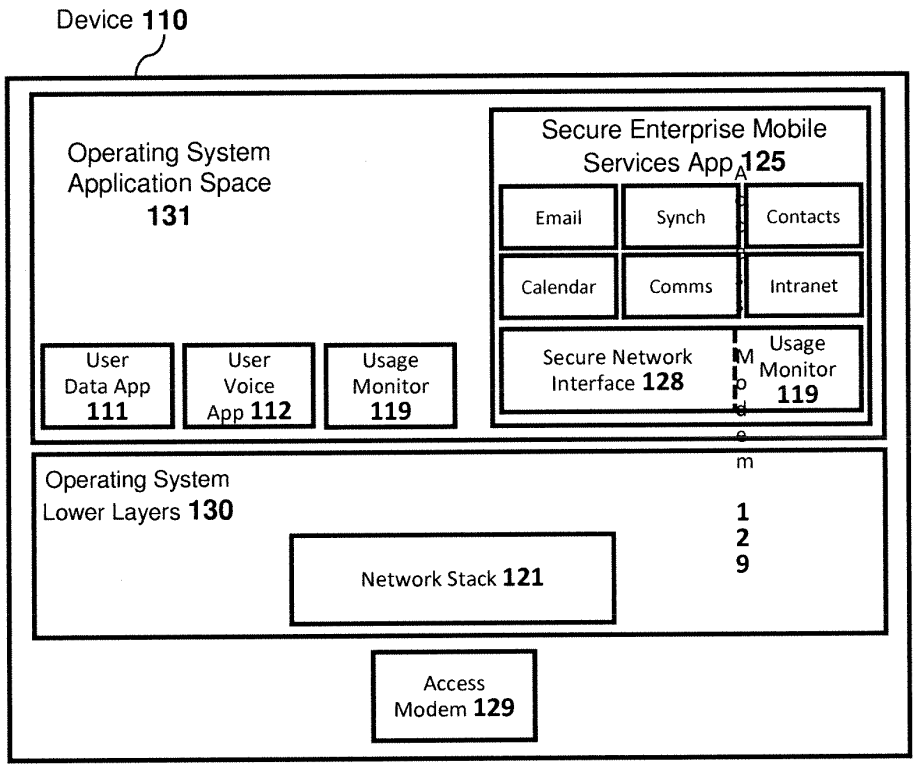

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Figure 23

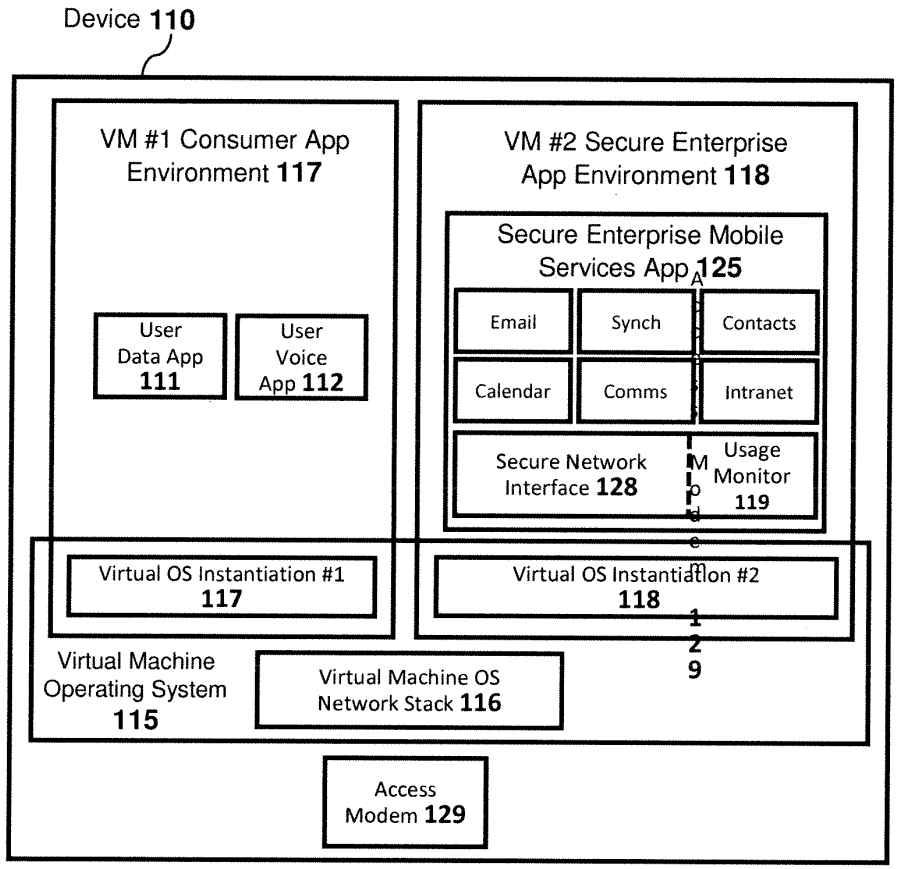

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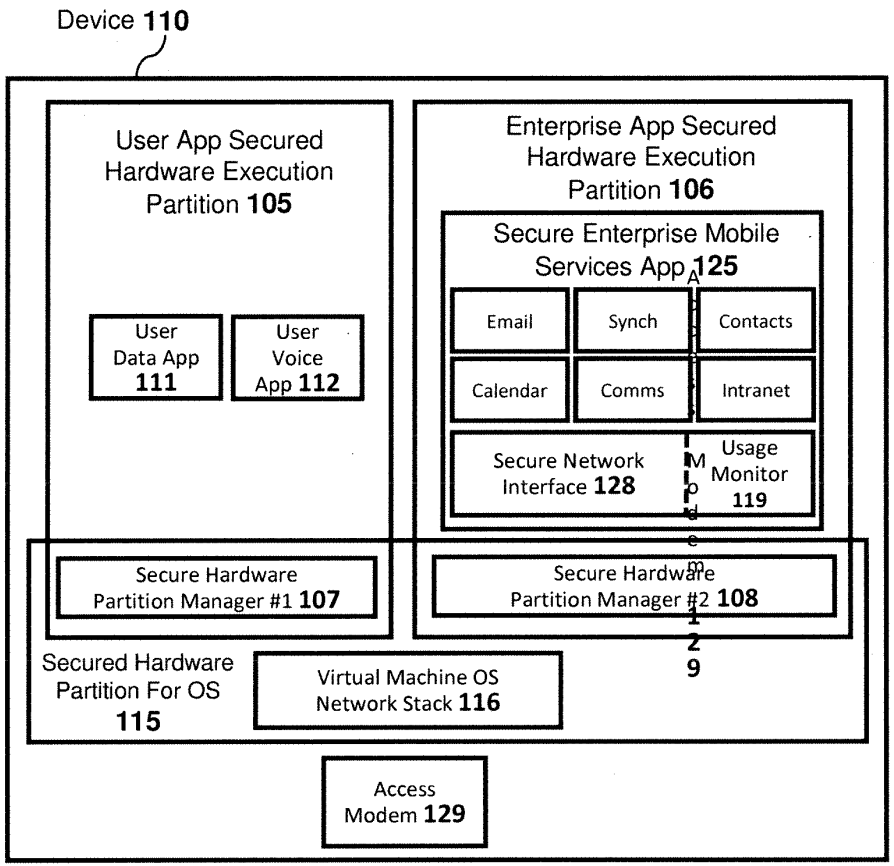

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Figure 25

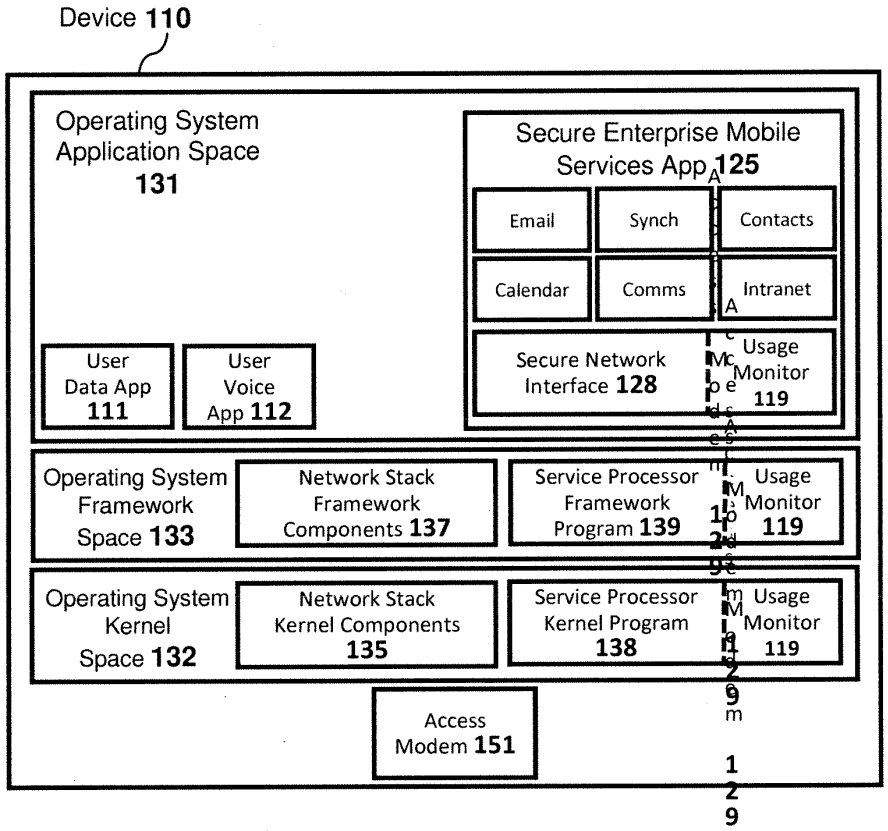

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Figure 26

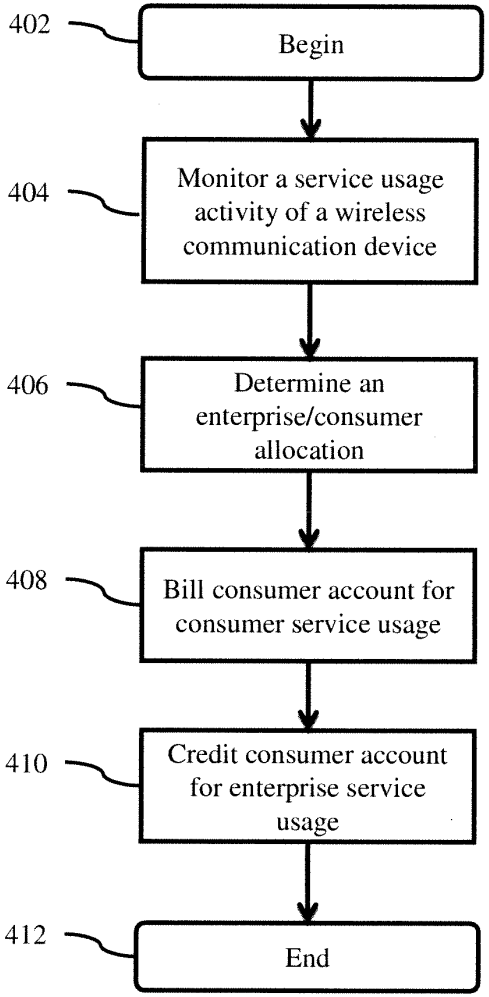


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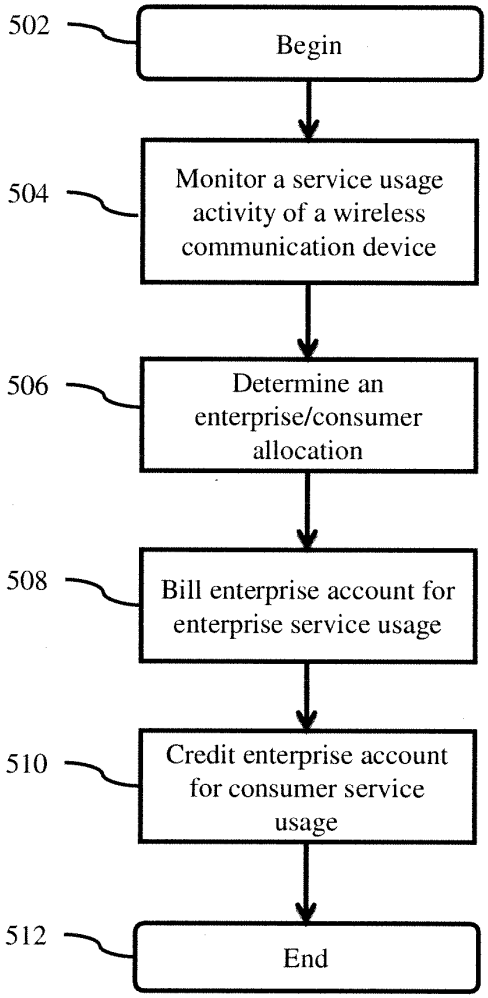


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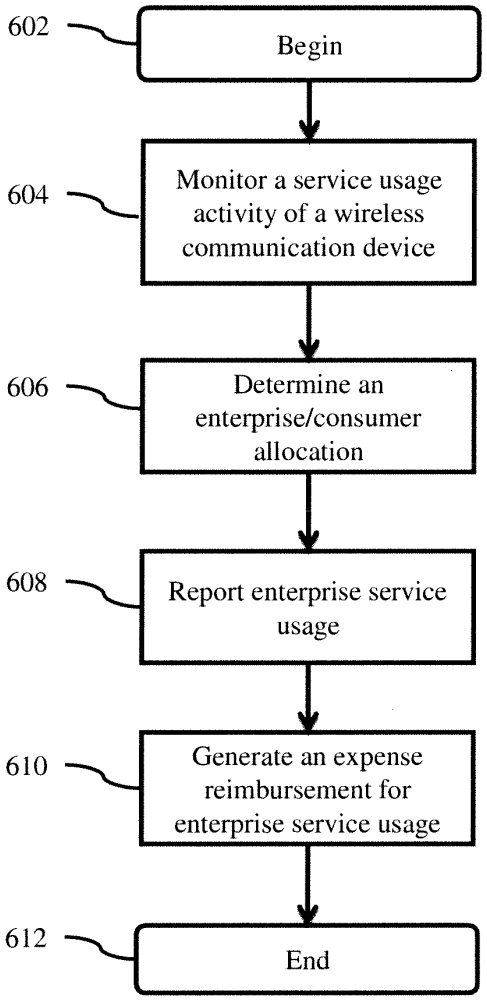


Figure 29

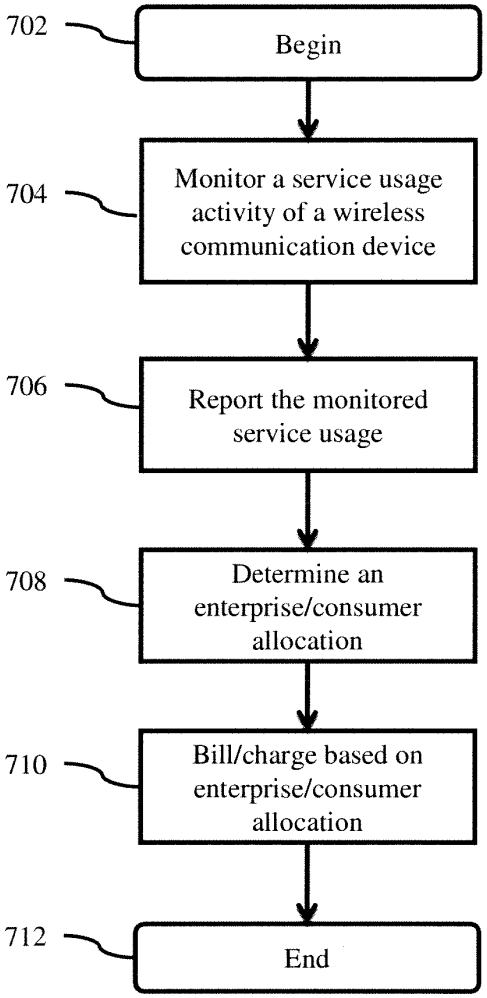


Figure 30

Electronic Patent Application Fee Transmittal	
Application Number:	
Filing Date:	
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Filer:	Marc A. Sockol/Linda Brost
Attorney Docket Number:	26WV-160514 [RALEP037]
Filed as Small Entity	

Utility under 35 USC 111(a) Filing Fees

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Basic Filing:				
Utility filing Fee (Electronic filing)	4011	1	95	95
Utility Search Fee	2111	1	310	310
Utility Examination Fee	2311	1	125	125
Pages:				
Claims:				
Claims in excess of 20	2202	5	30	150
Independent claims in excess of 3	2201	1	125	125
Miscellaneous-Filing:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD($)
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				
Miscellaneous:				
		Total in USD ($)		**805**

Electronic Acknowledgement Receipt	
EFS ID:	11073623
Application Number:	13248028
International Application Number:	
Confirmation Number:	8510
Title of Invention:	Enterprise Access Control and Accounting Allocation for Access Networks
First Named Inventor/Applicant Name:	Gregory G. Raleigh
Customer Number:	69849
Filer:	Marc A. Sockol/Linda Brost
Filer Authorized By:	Marc A. Sockol
Attorney Docket Number:	26WV-160514 [RALEP037]
Receipt Date:	28-SEP-2011
Filing Date:	
Time Stamp:	23:56:57
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	Deposit Account
Payment was successfully received in RAM	$805
RAM confirmation Number	7595
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1		160514Application092811.pdf	1831548 6c4fdbdde13607d9e9706327486189242 1d9d955	yes	114

Multipart Description/PDF files in .zip description

Document Description	Start	End
Transmittal of New Application	1	1
Authorization for Extension of Time all replies	2	2
Specification	3	86
Drawings-only black and white line drawings	87	114

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2	Fee Worksheet (SB06)	fee-info.pdf	38154 4999bb7e390c667fb508b99b0c460876d107ac73	no	2

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