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 | PATENT NUMBER | GROUP ART UNIT | FILE WRAPPER LOCATION |
|---|---|---|---|
| 14/988,350 | 10002607 | 2656 | 9200 |

OC000000111380446

## Correspondence Address/Fee Address Change

**The following fields have been set to Customer Number 69316 on 09/23/2019**

- **Correspondence Address**
- **Maintenance Fee Address**

**The address of record for Customer Number 69316 is:**

**69316**
**MICROSOFT CORPORATION**
**ONE MICROSOFT WAY**
**REDMOND, WA 98052**

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 | PATENT NUMBER | GROUP ART UNIT | FILE WRAPPER LOCATION |
|---|---|---|---|
| 14/988,350 | 10002607 | 2656 | 9200 |

OC000000110320531

# Correspondence Address/Fee Address Change

**The following fields have been set to Customer Number 69316 on 08/09/2019**

- **Correspondence Address**
- **Maintenance Fee Address**

**The address of record for Customer Number 69316 is:**

**69316**
**MICROSOFT CORPORATION**
**ONE MICROSOFT WAY**
**REDMOND, WA 98052**

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. | ISSUE DATE | PATENT NO. | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---|---|---|---|
| 14/988,350 | 06/19/2018 | 10002607 | 358721-US-NP | 7481 |

69316 7590 05/30/2018

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

# 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):

Gautam Deora, Hyderabad, INDIA;
Microsoft Technology Licensing, LLC, Redmond, WA;
Vikas Verma, Hyderabad, INDIA;
Saumya Chandra, Hyderabad, INDIA;
Manoj Lalavat, Hyderabat, INDIA;
Sonia Singh, Hyderabad, INDIA;
Badhri Ravikumar, Hyderabad, INDIA;
Anushree Bansal, Hyderabad, INDIA;
Snehita Peddi, Hyderabad, INDIA;

The United States represents the largest, most dynamic marketplace in the world and is an unparalleled location for business investment, innovation, and commercialization of new technologies. The USA offers tremendous resources and advantages for those who invest and manufacture goods here. Through SelectUSA, our nation works to encourage and facilitate business investment. To learn more about why the USA is the best country in the world to develop technology, manufacture products, and grow your business, visit SelectUSA.gov.

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

**CLAIMS**

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | 10/10/2017 | 02/19/2018 | | | | |
| | 1 | = | = | - | - | - | | | | |
| | 2 | = | = | - | - | - | | | | |
| | 3 | = | = | - | - | - | | | | |
| | 4 | = | = | - | - | - | | | | |
| | 5 | = | = | - | - | - | | | | |
| | 6 | = | = | - | - | - | | | | |
| | 7 | = | = | - | - | - | | | | |
| | 8 | = | = | - | - | - | | | | |
| | 9 | = | = | - | - | - | | | | |
| | 10 | = | = | - | - | - | | | | |
| | 11 | = | = | - | - | - | | | | |
| | 12 | = | = | - | - | - | | | | |
| | 13 | = | = | - | - | - | | | | |
| | 14 | = | = | - | - | - | | | | |
| | 15 | = | = | - | - | - | | | | |
| | 16 | ✓ | = | - | - | - | | | | |
| | 17 | O | - | - | - | - | | | | |
| | 18 | ✓ | = | - | - | - | | | | |
| | 19 | ✓ | = | - | - | - | | | | |
| | 20 | O | = | - | - | - | | | | |
| | 21 | | = | - | - | - | | | | |
| 1 | 22 | | | ✓ | ✓ | = | | | | |
| 2 | 23 | | | ✓ | ✓ | = | | | | |
| 3 | 24 | | | O | ✓ | = | | | | |
| 4 | 25 | | | ✓ | ✓ | = | | | | |
| 5 | 26 | | | ✓ | ✓ | = | | | | |
| 6 | 27 | | | ✓ | ✓ | = | | | | |
| 7 | 28 | | | ✓ | ✓ | = | | | | |
| 8 | 29 | | | ✓ | ✓ | = | | | | |
| 9 | 30 | | | ✓ | ✓ | = | | | | |
| 10 | 31 | | | ✓ | ✓ | = | | | | |
| 11 | 32 | | | ✓ | ✓ | = | | | | |
| 12 | 33 | | | ✓ | ✓ | = | | | | |
| 13 | 34 | | | ✓ | ✓ | = | | | | |
| 14 | 35 | | | ✓ | ✓ | = | | | | |
| 15 | 36 | | | ✓ | ✓ | = | | | | |
| 16 | 37 | | | ✓ | ✓ | = | | | | |
| 17 | 38 | | | ✓ | ✓ | = | | | | |
| 18 | 39 | | | ✓ | ✓ | = | | | | |
| 19 | 40 | | | ✓ | ✓ | = | | | | |
| 20 | 41 | | | ✓ | ✓ | = | | | | |

## 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)

69316 7590 02/23/2018
MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WASHINGTON 98052

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

TITLE OF INVENTION: Cross Device Companion Application For Phone

| APPLN. TYPE | ENTITY STATUS | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(S) DUE | DATE DUE |
|---|---|---|---|---|---|---|
| REGULAR | UNDISCOUNTED | $1000 | $0.00 | $0.00 | $1000 | 05/23/2018 |

| EXAMINER | ART UNIT | CLASS-SUBCLASS |
|---|---|---|
| TIEU, BINH KIEN | 2656 | 379-142010 |

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 International IP Law Group, PLLC
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: Microsoft Technology Licensing, LLC

(B) RESIDENCE: (CITY and STATE OR COUNTRY): Redmond, Washington

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.

☑ The director is hereby authorized to charge the required fee(s), any deficiency, or credits any overpayment, to Deposit Account Number 50-4474 (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

☐ Applicant asserting small entity status. See 37 CFR 1.27

☐ Applicant changing to regular undiscounted fee status.

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.
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.
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 /Barry D. Blount/ Date May 14, 2018

Typed or printed name Barry D. Blount Registration No. 35,069

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

| | | | |
|---|---|---|---|
| In re Application of: Gautam Deora, et al. | § | Confirmation No. | 7481 |
| Serial No.: 14/988,350 | § | Group Art Unit: | 2656 |
| Filed: January 5, 2016 | § | Examiner: | Tieu, Binh Kien |
| For: Cross Device Companion Application For Phone | § | Atty. Docket: | 358721-US-NP |

**MAIL STOP ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

CERTIFICATE OF TRANSMISSION OR MAILING
37 C.F.R. 1.8

I hereby certify that this correspondence is being transmitted by facsimile to the United States Patent and Trademark Office in accordance with 37 C.F.R. § 1.6(d), or is being transmitted via the Office electronic filing system in accordance with 37 C.F.R. § 1.6(a)(4), or is being deposited with the U.S. 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 below:

| May 14, 2018 | /Barry D. Blount/ |
|---|---|
| Date | Barry D. Blount, Reg. No. 35,069 |

Sir:

## COMMENTS ON STATEMENT OF REASONS FOR ALLOWANCE

On February 23, 2018, a Notice of Allowability and a Notice of Allowance and Fee(s) Due was mailed for the above-referenced application. Attached to the Notice of Allowability, the Examiner provided a Statement of Reasons for Allowance. The Applicants respectfully assert that the allowed claims recite a variety of unique features, including, but not limited to, the claim language cited by the Examiner in the Notice of Allowability. Therefore, although the Applicants gratefully acknowledges the Examiner's allowance of the present claims, the

Applicants do not concede that the reasons for allowance given by the Examiner are the only differences between the claims and the prior art.

Respectfully submitted,

Date: May 14, 2018

/Barry D. Blount/
Barry D. Blount
Reg. No. 35,069
(832) 375-0200

**CORRESPONDENCE ADDRESS:**
Microsoft Corporation
Patent Group Docketing Dept.
One Microsoft Way
Redmond, WA 98052

# Electronic Patent Application Fee Transmittal

| | |
|---|---|
| **Application Number:** | 14988350 |
| **Filing Date:** | 05-Jan-2016 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Filer:** | Barry D. Blount/Helen Tinsley |
| **Attorney Docket Number:** | 358721-US-NP |

Filed as Large Entity

**Filing Fees for Utility under 35 USC 111(a)**

| 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 | 1501 | 1 | 1000 | 1000 |

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Extension-of-Time:** | | | | |
| **Miscellaneous:** | | | | |
| | | | **Total in USD ($)** | **1000** |

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 32615561 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Helen Tinsley |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 14-MAY-2018 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 17:49:14 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | yes |
| Payment Type | CARD |
| Payment was successfully received in RAM | $1000 |
| RAM confirmation Number | 051518INTEFSW17504400 |
| Deposit Account | |
| Authorized User | |

The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows:

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | Issue Fee Payment (PTO-85B) | 358721-US-NP-Issue_Fee_due_5-23-18_Filed_5-14-18-cpdf.pdf | 153671<br>1a11bea5c8b4d26ff185ddbeeb16542fe6e82104 | no | 1 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 2 | Post Allowance Communication - Incoming | 358721-US-NP-Comments-on-Reasons-for-Allowance.pdf | 18735<br>90c3ae38aa5478b4ea3da1206205c32fb09f8714 | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 3 | Fee Worksheet (SB06) | fee-info.pdf | 30296<br>eadd75b9a8d61730236902023c21045f0e180795 | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | **Total Files Size (in bytes):** | 202702 | | |

**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

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

69316 7590 02/23/2018

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WASHINGTON 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

DATE MAILED: 02/23/2018

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

TITLE OF INVENTION: Cross Device Companion Application For Phone

| APPLN. TYPE | ENTITY STATUS | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(S) DUE | DATE DUE |
|---|---|---|---|---|---|---|
| REGULAR | UNDISCOUNTED | $1000 | $0.00 | $0.00 | $1000 | 05/23/2018 |

**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)

69316 7590 02/23/2018
MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WASHINGTON 98052

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

TITLE OF INVENTION: Cross Device Companion Application For Phone

| APPLN. TYPE | ENTITY STATUS | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(S) DUE | DATE DUE |
|---|---|---|---|---|---|---|
| REGULAR | UNDISCOUNTED | $1000 | $0.00 | $0.00 | $1000 | 05/23/2018 |

| EXAMINER | ART UNIT | CLASS-SUBCLASS |
|---|---|---|
| TIEU, BINH KIEN | 2656 | 379-142010 |

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

❑ Applicant asserting small entity status. See 37 CFR 1.27

❑ Applicant changing to regular undiscounted fee status.

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.
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.
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. _____

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

69316 7590 02/23/2018

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WASHINGTON 98052

| EXAMINER | |
|---|---|
| TIEU, BINH KIEN | |
| **ART UNIT** | **PAPER NUMBER** |
| 2656 | |

DATE MAILED: 02/23/2018

## 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. 14/988,350 | Applicant(s) Deora et al. | |
|---|---|---|---|
| | Examiner BINH K TIEU | Art Unit 2656 | AIA Status Yes |

***-- 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 01/30/2018 .
   ☐ 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 22-41 . 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 areply 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 _____ .

/Binh Kien Tieu/
Primary Examiner, Art Unit 2656

## DETAILED ACTION

### *Allowable Subject Matter*

1. Claims 22-41 are allowed.

2. The following is an examiner's statement of reasons for allowance:

The statement of reasons for allowance of claims 22-41 are based on the arguments of the Appellants filed in their Appeal Brief on 01/30/2018. According to the arguments stated on pages 9-11 regarding to the features of a speech-to-text transcript, a cloud service and data that is machine-learned, the arguments were carefully reviewed. The speech-to-text transcript and cloud service are provided by a service 120, as shown in figure 1, may be located in the cloud as described in paragraph [00191] in the Specification. Even though the structure of the cloud service 120 was not clearly recited in the independent method claim 22, but the independent claims 22 recited at least **two** components to process a method of claim 22 with their performing functions. Therefore, the cloud service 120 is determined as an **additional** element that make claim 22 is eligible or amount to significantly more than the abstract idea. Other independent claims 36 and 40 are also allowed with the same reasons set forth in claim 22.

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."

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to BINH TIEU whose telephone number is (571)272-7510. The examiner can normally be reached on 9-5. The Examiner's fax number is (571) 273-7510 and E-mail address: BINH.TIEU@USPTO.GOV.

Examiner interviews are available via telephone, in-person, and video conferencing using a USPTO supplied web-based collaboration tool. To schedule an interview, applicant is encouraged to use the USPTO Automated Interview Request (AIR) at http://www.uspto.gov/interviewpractice.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, CURTIS KUNTZ can be reached on (571) 272-7499.

Any response to this action should be mailed or handed carry deliveries to:

Commissioner of Patents and Trademarks
401 Dulany Street
Alexandria, VA 22314

Or faxed to: (571) 273-8300

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (FAIR) 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 FAIR system, see http://pair-direct.uspto.gov. If you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/Binh Kien Tieu/
Primary Examiner, Art Unit 2656

Date: February 2018

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

**CLAIMS**

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | 10/10/2017 | 02/19/2018 | | | | |
| | 1 | = | = | - | - | - | | | | |
| | 2 | = | = | - | - | - | | | | |
| | 3 | = | = | - | - | - | | | | |
| | 4 | = | = | - | - | - | | | | |
| | 5 | = | = | - | - | - | | | | |
| | 6 | = | = | - | - | - | | | | |
| | 7 | = | = | - | - | - | | | | |
| | 8 | = | = | - | - | - | | | | |
| | 9 | = | = | - | - | - | | | | |
| | 10 | = | = | - | - | - | | | | |
| | 11 | = | = | - | - | - | | | | |
| | 12 | = | = | - | - | - | | | | |
| | 13 | = | = | - | - | - | | | | |
| | 14 | = | = | - | - | - | | | | |
| | 15 | = | = | - | - | - | | | | |
| | 16 | ✓ | = | - | - | - | | | | |
| | 17 | O | - | - | - | - | | | | |
| | 18 | ✓ | = | - | - | - | | | | |
| | 19 | ✓ | = | - | - | - | | | | |
| | 20 | O | = | - | - | - | | | | |
| | 21 | | = | - | - | - | | | | |
| 1 | 22 | | | ✓ | ✓ | = | | | | |
| 2 | 23 | | | ✓ | ✓ | = | | | | |
| 3 | 24 | | | O | ✓ | = | | | | |
| 4 | 25 | | | ✓ | ✓ | = | | | | |
| 5 | 26 | | | ✓ | ✓ | = | | | | |
| 6 | 27 | | | ✓ | ✓ | = | | | | |
| 7 | 28 | | | ✓ | ✓ | = | | | | |
| 8 | 29 | | | ✓ | ✓ | = | | | | |
| 9 | 30 | | | ✓ | ✓ | = | | | | |
| 10 | 31 | | | ✓ | ✓ | = | | | | |
| 11 | 32 | | | ✓ | ✓ | = | | | | |
| 12 | 33 | | | ✓ | ✓ | = | | | | |
| 3 | 34 | | | ✓ | ✓ | = | | | | |
| 4 | 35 | | | ✓ | ✓ | = | | | | |
| 5 | 36 | | | ✓ | ✓ | = | | | | |
| 16 | 37 | | | ✓ | ✓ | = | | | | |
| 7 | 38 | | | ✓ | ✓ | = | | | | |
| 8 | 39 | | | ✓ | ✓ | = | | | | |
| 9 | 40 | | | ✓ | ✓ | = | | | | |
| 20 | 41 | | | ✓ | ✓ | = | | | | |

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | **Examiner** | **Art Unit** |
| | BINH K TIEU | 2656 |

| CPC | | | | | | |
|---|---|---|---|---|---|---|
| **Symbol** | | | | | **Type** | **Version** |
| G10L | / | 15 | / | 065 | F | 2013-01-01 |
| H04M | / | 3 | / | 42042 | I | 2013-01-01 |
| H04L | / | 67 | / | 306 | I | 2013-01-01 |
| G06F | / | 3 | / | 002 | I | 2013-01-01 |
| G10L | / | 15 | / | 00 | I | 2013-01-01 |
| G10L | / | 15 | / | 22 | I | 2013-01-01 |
| G10L | / | 15 | / | 26 | I | 2013-01-01 |
| H04M | / | 1 | / | 575 | I | 2013-01-01 |
| H04M | / | 1 | / | 72583 | I | 2013-01-01 |
| H04M | / | 1 | / | 72597 | I | 2013-01-01 |
| H04W | / | 8 | / | 26 | I | 2013-01-01 |
| G06F | / | 3 | / | 04842 | I | 2013-01-01 |
| G06Q | / | 10 | / | 109 | I | 2013-01-01 |
| H04M | / | 1 | / | 274516 | I | 2013-01-01 |
| H04M | / | 1 | / | 56 | I | 2013-01-01 |
| H04M | / | 1 | / | 72522 | I | 2013-01-01 |
| H04M | / | 7 | / | 0024 | I | 2013-01-01 |
| G06N | / | 99 | / | 005 | A | 2013-01-01 |
| H04M | / | 3 | / | 42221 | A | 2013-01-01 |
| H04M | / | 3 | / | 4365 | A | 2013-01-01 |
| H04M | / | 7 | / | 0036 | A | 2013-01-01 |
| H04W | / | 88 | / | 02 | A | 2013-01-01 |
| H04M | / | 2203 | / | 2011 | A | 2013-01-01 |
| H04M | / | 2203 | / | 2038 | A | 2013-01-01 |
| H04M | / | 2250 | / | 68 | A | 2013-01-01 |
| H04M | / | 2201 | / | 40 | A | 2013-01-01 |
| H04M | / | 2250 | / | 60 | A | 2013-01-01 |
| H04W | / | 76 | / | 10 | A | 2018-02-01 |

| NONE | | **Total Claims Allowed:** | |
|---|---|---|---|
| (Assistant Examiner) | (Date) | 20 | |
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | 19 February 2018 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

U.S. Patent and Trademark Office

Part of Paper No.: 20180219

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| CPC Combination Sets | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| Symbol | | | | | Type | Set | Ranking | Version |
| | / | | / | | | | | |

| | | | |
|---|---|---|---|
| NONE | | Total Claims Allowed: | |
| (Assistant Examiner) | (Date) | 20 | |
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | 19 February 2018 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

U.S. Patent and Trademark Office

Part of Paper No.: 20180219



Patent Owner Ex. 2102
Page 21 of 304

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| INTERNATIONAL CLASSIFICATION | | | | |
|---|---|---|---|---|
| CLAIMED | | | | |
| H04M | / | 56 | / | |
| H04M | / | 06 | / | |

| NON-CLAIMED | | | | |
|---|---|---|---|---|
| | / | | / | |

| US ORIGINAL CLASSIFICATION | |
|---|---|
| CLASS | SUBCLASS |
| 379 | 142.01 |

| CROSS REFERENCES(S) | | | | | | |
|---|---|---|---|---|---|---|
| CLASS | SUBCLASS (ONE SUBCLASS PER BLOCK) | | | | | |
| 379 | 142.04 | 142.14 | 142.17 | | | |

| NONE | | Total Claims Allowed: | |
|---|---|---|---|
| (Assistant Examiner) | (Date) | 20 | |
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | 19 February 2018 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

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

**CLAIMS**

| Final | Original | Final | Original | Final | Original | Final | Original | Final | Original | Final | Original | Final | Original | Final | Original |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | 1 | | 10 | | 19 | 7 | 28 | 16 | 37 | | | | | | |
| | 2 | | 11 | | 20 | 8 | 29 | 7 | 38 | | | | | | |
| | 3 | | 12 | | 21 | 9 | 30 | 18 | 39 | | | | | | |
| | 4 | | 13 | 1 | 22 | 10 | 31 | 19 | 40 | | | | | | |
| | 5 | | 14 | 2 | 23 | 11 | 32 | 20 | 41 | | | | | | |
| | 6 | | 15 | 3 | 24 | 12 | 33 | | | | | | | | |
| | 7 | | 16 | 4 | 25 | 13 | 34 | | | | | | | | |
| | 8 | | 17 | 5 | 26 | 14 | 35 | | | | | | | | |
| | 9 | | 18 | 6 | 27 | 15 | 36 | | | | | | | | |

| | | | |
|---|---|---|---|
| NONE | | **Total Claims Allowed:** | |
| (Assistant Examiner) | (Date) | 20 | |
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | 19 February 2018 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

U.S. Patent and Trademark Office

Part of Paper No.: 20180219



Patent Owner Ex. 2102
Page 23 of 304

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| CPC - Searched* | | |
|---|---|---|
| Symbol | Date | Examiner |
| H04M 2201/40, 2203/251, 2203/352, 2203/353, 3/2209, 1/64, 3/493 | 07/07/2016 | /BKT/ |
| H04L 51/04, 51/32 | 07/07/2016 | /BKT/ |
| G06Q 10/10 | 07/07/2016 | /BKT/ |

| CPC Combination Sets - Searched* | | |
|---|---|---|
| Symbol | Date | Examiner |
| | | |

| US Classification - Searched* | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| 379/ | 88.19, 88.2, 93.17, 93.23, 142.01, 142.06, 142.09, 142.14, 142.17, 245, 247 | 07/07/2016 | /BKT/ |
| UPDATED | SEARCHES | 10/29/2016 | /BKT/ |
| 379 | 142.04, | 10/29/2016 | /BKT/ |
| UPDATED | SEARCHES | 03/01/2017 | /BKT/ |
| UPDATED | SEARCHES | 10/10/2017 | /BKT/ |
| UPDATED | SEARCHES | 02/19/2018 | /BKT/ |

* See search history printout included with this form or the SEARCH NOTES box below to determine the scope of the search.

| Search Notes | | |
|---|---|---|
| Search Notes | Date | Examiner |
| WEST DATABASES TERMS SEARCHES | 07/07/2016 | /BKT/ |
| WEST DATABASES TERMS SEARCHES | 03/01/2017 | /BKT/ |
| WEST DATABASES TERMS SEARCHES | 10/10/2017 | /BKT/ |

| | |
|---|---|
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | |

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14/988,350 | Deora et al. |
| | Examiner | Art Unit |
| | BINH K TIEU | 2656 |

| Interference Search | | | |
|---|---|---|---|
| US Class/CPC Symbol | US Subclass/CPC Group | Date | Examiner |
| 379 | 142.01, 142.04, 142.14, 142.17 | 10/29/2016 | /BKT/ |

| | |
|---|---|
| /Binh Kien Tieu/<br>Primary Examiner, Art Unit 2656 | |

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

| | | | | |
|---|---|---|---|---|
| In re Application of: | | | | |
| | Gautam Deora, et al. | § | Confirmation No. | 7481 |
| | | § | | |
| Serial No.: | 14/988,350 | § | Group Art Unit: | 2656 |
| | | § | | |
| Filed: | January 5, 2016 | § | Examiner: | Tieu, Binh Kien |
| | | § | | |
| For: | Cross Device Companion Application For Phone | § | Atty Docket: | 358721-US-NP |
| | | § | | |
| | | § | | |

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

CERTIFICATE OF TRANSMISSION OR MAILING
37 C.F.R. 1.8

I hereby certify that this correspondence is being transmitted by facsimile to the United States Patent and Trademark Office in accordance with 37 C.F.R. § 1.6(d), or is being transmitted via the Office electronic filing system in accordance with 37 C.F.R. § 1.6(a)(4), or is being deposited with the U.S. 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 below:

| January 30, 2018 | /Barry D. Blount/ |
|---|---|
| Date | Barry D. Blount, Reg. No. 35,069 |

# APPEAL BRIEF PURSUANT TO 37 C.F.R. §§ 41.31 AND 41.37

This Appeal Brief is being filed in response to the Final Office Action mailed on October 13, 2017, and in furtherance of a Notice of Appeal filed December 5, 2017.

## 1. REAL PARTY IN INTEREST

The real party in interest is Microsoft Technology Licensing, LLC (hereinafter "Microsoft"). Microsoft has a principal place of business at One Microsoft Way, Redmond, Washington 98052.

## 2. RELATED APPEALS AND INTERFERENCES

The Appellants are unaware of any other appeals or interferences related to this Appeal. The undersigned is Appellants' legal representative in this Appeal.

## 3. STATUS OF CLAIMS

Claims 22-41 are currently pending, are currently under rejection and, thus, are the subject of this appeal. Claims 1-21 have been canceled and are not part of this appeal.

## 4. STATUS OF AMENDMENTS

There are no outstanding amendments to be considered by the Board.

## 5. SUMMARY OF CLAIMED SUBJECT MATTER

The Application contains three independent claims, namely, claims 22, 36, and 40, all of which are the subject of this Appeal. As an example, each of the independent claims relate generally to providing context to a phone call. *See* Application, paras. [0019], [0020]. The Application also contains dependent claims 23-35, 37-39, and 41. The subject matter of claims 22, 36, and 40 is summarized below.

With regard to independent claim 22, discussions of the recited features can be found at least in the below-cited locations of the specification and drawings. By way of example, claim 22 recites a method of providing context to a phone call. *See* Application, paras. [0019], [0020]. The method includes receiving the phone call. *See id.*, para. [0015]. The method also includes selecting a first computer application that is relevant to the phone call based on tracking data (e.g., 140) associated with one or more previous phone calls and the phone call. *See id.*, paras. [0027], [0028]; Fig. 2. The tracking data (e.g., 140) is based on a speech-to-text transcript (e.g., 124) of the phone call that is generated by a cloud service during the phone call, and first data and second data that is machine-learned from the tracking data (e.g., 140). *See id.*, paras. [0020], [0033], [0034], [0058], [0070]; Figs. 1, 2. The first data includes a type of communication describing the phone call. *See id.*, paras. [0019], [0026], [0031]. The second data includes an action describing a concern of the phone call. *See id.*, para. [0026]. The tracking data (e.g., 140) includes a second application used during the previous phone calls. *See id.*, paras. [0026], [0029], [0033]; Fig. 2. Additionally, the method includes presenting the first computer application on one or more available devices. *See id.*, paras. [0028], [0029], [0031].

With regard to independent claim 36, discussions of the recited features can be found at least in the below-cited locations of the specification and drawings. By way of example, claim 36 recites a computer-readable storage device storing computer-executable instructions. When executed by a computer processor, the computer-executable instructions cause the computer processor to receive a phone call. *See id.*, paras. [0019], [0020]. Additionally, the computer-executable instructions cause the computer processor to select a first computer application that is relevant to the phone call based on tracking data (e.g., 140) associated with one or more previous phone calls and the phone call. *See id.*, paras. [0027], [0028]; Fig. 2. The tracking data (e.g., 140) is based on a speech-to-text transcript (e.g., 124) of the phone call that is generated by a cloud service during the phone call, and first data and second data that is machine-learned from the tracking data (e.g., 140). *See id.*, paras. [0020], [0033], [0034], [0058], [0070];

Figs. 1, 2. The first data includes a type of communication describing the phone call. *See id.*, paras. [0019], [0026], [0031]. The second data includes an action describing a concern of the phone call. *See id.*, para. [0026]. The tracking data (e.g., 140) includes a second application used during the previous phone calls. *See id.*, paras. [0026], [0029], [0033]; Fig. 2. The computer-executable instructions also cause the computer processor to present the first computer application on one or more available devices. *See id.*, paras. [0028], [0029], [0031].

With regard to independent claim 40, discussions of the recited features can be found at least in the below-cited locations of the specification and drawings. By way of example, claim 40 recites an apparatus. The apparatus includes a processing unit, and a memory comprising computer-executable code. When executed by the processing unit, the computer-executable code causes the processing unit to receive a phone call. *See id.*, paras. [0019], [0020]. Additionally, the computer-executable code causes the processing unit to select a first computer application that is relevant to the phone call based on tracking data (e.g., 140) associated with one or more previous phone calls and the phone call. *See id.*, paras. [0027], [0028]; Fig. 2. The tracking data (e.g., 140) is based on a speech-to-text transcript (e.g., 124) of the phone call that is generated by a cloud service during the phone call, and first data and second data machine-learned from the tracking data (e.g., 140). *See id.*, paras. [0020], [0033], [0034], [0058], [0070]; Figs. 1, 2. The first data includes a type of communication describing the phone call. The second data includes an action describing a concern of the phone call. *See id.*, paras. [0019], [0026], [0031]. The tracking data (e.g., 140) includes a second application used during the previous phone calls. *See id.*, paras. [0026], [029], [0033]; Fig. 2. Further, the computer-executable code causes the processing unit to present the first computer application on one or more available devices. *See id.*, paras. [0028], [0029], [0031].

## 6. GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

### A. First Ground of Rejection for Review on Appeal

The Appellants respectfully urge the Board to review and reverse the Examiner's first ground of rejection in which the Examiner rejected claims 22-41 under 35 U.S.C. § 101 alleging the claimed invention is directed to a judicial exception without significantly more.

## 7. ARGUMENT

As discussed in detail below, the Examiner has improperly rejected the pending claims. Further, the Examiner has misapplied long-standing and binding legal precedents and principles in rejecting the claims under 35 U.S.C. § 101. Accordingly, the Appellants respectfully request full and favorable consideration by the Board, as the Appellants assert that claims 22-41 are currently in condition for allowance.

### A. Ground of Rejection No. 1

With regard to the rejection of claims 22-41 under 35 U.S.C. § 101, the Examiner specifically stated:

> Claim 22 is directed to a process or series of acts for providing context to a phone call …
>
> This concept is similar in concept to those of Court cases in the "Interim Eligibility Guidance Quick Reference Sheet Identifying Abstract Ideas", which was identified by the courts as an abstract idea (Electric Power Group, SmartGene, and Classen). The claim further recited the feature of wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, which is a conventional step … not an additional element that make the claim eligible or not amount to significantly more than the abstract idea.
>
> According to the Court cases, Electric Power Group, SmartGene and Classen, the step of receiving the phone call along with the tracking data from the cloud service is mapped to the step of "collecting

> information" in the Electric Power Group and Classen. Furthermore, the step of electing a first computer application is mapped to the steps of "comparing and analyzing information/data" in the Court cases. Finally, the step of presenting the first computer application on one or more available devices is mapped to the steps of "displaying and identifying results or options" in the Electric Power Group and Smartgene. Therefore, claim 22 does NOT recited any additional elements (left-over) beyond the identified abstract idea which make the claim eligible.
>
> The claim(s) does/do not include additional elements that are sufficient to amount to significantly more than the judicial …
>
> The additional elements or combination of elements in this claim other than the abstract idea per se amounts to no more than (i) mere instructions to implement the idea on a computer, and/or (ii) recitation of generic computer structure that serves to perform generic computer functions that are well understood …
>
> Regarding claims 36 and 40, Alice Corp. also establishes the same analysis should be used for all categories of claims …
>
> Dependent claims 23-35 and 37-39 and 41 are rejected with the reasons as set forth above.

Final Office Action, pp. 5-8 (Emphasis in original).

The Examiner has the burden of setting forth a *prima facie* case that the claimed subject matter falls outside of the statutory categories defined in 35 U.S.C. § 101. M.P.E.P. § 2100 (IV)(B). Section 101 states that "[w]hoever invents or discovers any new and useful *process*, *machine*, *manufacture*, or *composition of matter*, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title." 35 U.S.C. § 101 (emphasis added). "In choosing such expansive terms modified by the comprehensive 'any,' Congress plainly contemplated that the patent laws would be given wide scope." *Bilski v. Kappos*, 561 U.S. 593 (2010)). In fact, Congress intended this statute to include "anything under the sun that is made by man." *Diamond v. Chakrabarty*, 447 U.S. 303, 308-09, 206 U.S.P.Q. 193, 197 (1980).

To determine patent eligibility, one must first determine whether the claims are directed to a judicially recognized exception. *See Alice Corp. v. CLS Bank Int'l*, 134 S. Ct. 2347, 2355 (2014). The Supreme Court has "set forth a framework for distinguishing patents that claim laws of nature, natural phenomena, and abstract ideas from those that claim patent-eligible applications of those concepts." *Alice Corp.*, 134 S. Ct. at 2355. As the Supreme Court has made clear, too broad an interpretation of these exclusions from the grant in §101 "could eviscerate patent law." *Id.* (quoting *Mayo Collaborative v. Prometheus Laboratories, Inc.*, 132 S. Ct. 1289, 1293 (2012)). It has long been recognized that an application of an abstract principle, a law of nature, or physical phenomena to a known structure or process may well be deserving of patent protection. *See Diamond v. Diehr*, 450 U.S. 175, 185, 187 (1981); *Research Corp. Technologies v. Microsoft Corp.*, 627 F.3d 859 (Fed. Cir. 2010). After all, "all inventions at some level embody, use, reflect, rest upon, or apply laws of nature, natural phenomena, or abstract ideas." *Mayo Collaborative v. Prometheus Laboratories, Inc.*, 132 S. Ct. 1289, 1293 (2012).

Accordingly, Examiners "must provide an explanation as to why each claim is unpatentable, which must be sufficiently clear and specific." USPTO Memorandum titled "Formulating a Subject Matter Eligibility Rejection and Evaluating the Applicant's Response to a Subject Matter Eligibility Rejection," dated May 4, 2016, p. 2. The explanation as to why a claim is unpatentable should "identify specific claim limitations and explain why those claim limitations set forth a judicial exception (*e.g.* an abstract idea)." *Id.* If the Examiner determines that a claim recites an abstract idea, "the rejection should identify the abstract idea as it is recited…and explain why it corresponds to a concept that the courts have identified as an abstract idea." *Id.* With regard to software in particular, the Federal Circuit has held that "[s]oftware can make non-abstract improvements to computer technology just as hardware improvements can, and sometimes the improvements can be accomplished through either route." *Enfish, LLC v. Microsoft Corporation, 822 F.3d 1327, 1335 (Fed. Cir. 2016).* (Slip Op. at p. 11).

Moreover, the courts have held that "[w]hether at step one or step two of the *Alice* test, in determining the patentability of a method, a court must look to the claims as an ordered combination, without ignoring the requirement of the individual steps." *McRO, Inc. v. Bandai Namco Games America Inc., 837 F. 3d 1299, 1313 (Fed. Cir. 2016).* (Slip Op. at p. 21). Furthermore, courts "'must be careful to avoid oversimplifying the claims' by looking at them generally and failing to account for the specific requirements of the claims." *Id.*

The courts have also held that if a claim is directed to a patent-ineligible concept such as an abstract idea, then "something more" in the claim can transform the claim to a patent-eligible concept to satisfy Section 101. *See Alice Corp. v. CLS Bank Int'l*, 134 S. Ct. 2347, 2354 (2014). For example, in *Alice Corp. v. CLS Bank Int'l*, the Supreme Court held that claims merely requiring generic computer implementation failed to transform an abstract idea into a patent eligible invention. *See id.* However, the Court clarified that claims involving computer implementation with a patent-ineligible concept such as an abstract idea, that improves the function of the computer itself or effects an improvement in any other technology or technical field, may be sufficient to transform the abstract idea into a patent-eligible invention. *See id.* Again, all inventions generally involve abstract concepts. *See Preliminary Examination Instructions in view of the Supreme Court Decision in Alice Corporation Ply. Ltd. v. CLS Bank International, et al.*, Andrew H. Hirshfeld, Deputy Commissioner for Patent Examination Policy, June 25, 2014. Computer implementation of an abstract idea may be patent eligible for reasons such as: (1) improvements to the functioning of the computer; (2) improvements to another technology or technical fields; and (3) meaningful limitations beyond generally linking the use of an abstract idea to a particular technological environment. *See id.*

***Independent claims 22, 36, 40 recite patent eligible subject matter.***

Claims 22, 36, and 40 recite a method, a computer-readable medium, and an apparatus, and thus, are directed to a process, a manufacture, and a machine, respectively, which are statutory categories of invention. *See* 35 U.S.C. § 101. Further, claims 22-41

are not directed to an abstract idea with only mere generic computer implementation, but instead are plainly patent eligible. The claims are directed to providing machine-learned context for a phone call during the phone call. Such does not describe a fundamental economic practice, a method of organizing human activity, or an idea itself (standing alone). Claim 22 recites, "selecting a … computer application that is relevant to the phone call based on … a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and … data that is machine-learned." (Emphasis added). The claims thus do not merely recite the performance of some practice known from the pre-computer world along with the requirement to perform it on the computer. *See DDR Holdings, LLC v. Hotels.com*, 113 U.S.P.Q.2d 1097 (Fed. Cir. 2014) (holding that computer claims involving the Internet were not directed to an abstract idea). Rather, the claims recite limitations related to the technical fields of speech recognition, machine learning, and the cloud. The Appellants respectfully note that the very nature of machine learning and the cloud inextricably ties these technical fields to computer technology. Further, due to its complexity, speech recognition is also tied to computer technology. Thus, the claims are not abstract.

Additionally, the independent claims recite concepts that are distinct from the types of concepts found by the courts to be abstract. For example, in *SmartGene*, the Federal Circuit stated, "[B]ased on earlier precedents, this court held that section 101 did not embrace a process defined simply as using a computer to perform a series of mental steps that people, aware of each step, can and regularly do perform in their heads." *SmartGene v. ABL* (Fed. Cir. 2014) (*citing to CyberSource Corp. v. Retail Decisions, Inc.*, 654 F.3d 1366, 1373 (Fed. Cir. 2011)). However, unlike the collections of data recited in *SmartGene*, the claims recite data that is machine-learned. It is not possible for a person to "machine-learn" from a transcript generated by a cloud service, not during a phone call. Thus, the independent claims recite concepts that are distinct from the abstract concepts in *SmartGene*.

The claims in *Classen* describe the use of the scientific method to determine the more effective of two vaccine schedules. *Classen Immunotherapies, Inc. v. Biogen Idec 659 F.3d 1057, 1064 (Fed. Cir. 2011).* In *Classen*, the claim precisely specifies the parameters of an experiment according to the scientific method in reciting, "the first group … having been immunized … according to a first … schedule, and the second group … having been immunized … according to a second … schedule." The claims also recite, "comparing the effectiveness of … immunization schedules in protecting against or inducing a chronic immune-mediated disorder." Thus, *Classen's* single vaccine is used against a chronic immune-mediated disorder in two different groups, according to the different vaccine schedules. In this way, the vaccine schedule represents an independent variable that changes in each group, indicating a result that allows one to independently compare the two schedules. Thus, the claims in *Classen* would presumably represent a broad preemption, which the courts have warned against, to using the scientific method to determine the effectiveness of immunization schedules. Further, the *Classen* court found the representative claim merely recites, "collecting and comparing known information." *Id.*, p. 1075. For at least these reasons, the *Classen* court found the representative claim abstract.

In contrast, the independent claims do not recite parameters of the scientific method, or any method to preempt claims with a breadth comparable to the *Classen* claims. Rather, the independent claim 22 recites a novel method that provides context for one of the participants in a telephone call. The preemption of such a claim is limited to the recited features, which do not encompass anything comparable to a scientific method for vaccine schedules. Further, the independent claims do not merely collect and compare known information. Rather, the independent claims generally recite machine-learning types of communication, for example, which is not a comparison of known information. In these ways, the independent claims are distinct from the abstract concepts at issue in *Classen.*

In *Electric Power Group*, the claims merely recite collecting data from multiple sources, and displaying the data as organized into categories. *See Electric Power Group v. Alstom S.A., et al., 830 F.3d 1350 (2016).* (Slip op. at pp. 2-4). For example, the representative claim in *Electric Power Group* recites, "receiving a plurality of data stream … data from other … power system data sources … [and] non-grid data sources," and, "displaying … metrics from different categories of data and the derived metrics in visuals, tables, charts, or combinations thereof, the data comprising at least one of monitoring data, tracking data, historical data, prediction data, and summary data." Further, *Electric Power Group's* claim also recites an analysis, but the parameters of the analysis are so wide ranging as to be meaningless. The representative claim recites, "detecting and analyzing events … based on at least one of limits, sensitivities and rates of change for one or more measurements … and dynamic stability metrics." (Emphasis added). In contrast, the independent claims recite, "first data [comprising a type of communication] and second data [comprising an action describing the call] that is machine-learned from the tracking data [associated with previous phone calls]." Thus, the independent claims recite specific features to provide context to a phone call, unlike *Electric Power Group's* long list of options that appear to make the recited event analysis vague. For at least these reasons, the independent claims are distinct from the abstract concepts at issue in *Electric Power Group*.

For at least these reasons, the independent claims are distinct from the concepts found by the courts to be abstract. Thus, the independent claims are not directed to an abstract idea.

However, even if the claims encompass an abstract idea, claims 22-41 recite features such that the claims are significantly more than an abstract idea. These features include a speech-to-text translation, cloud services, and machine learning, which constitute meaningful limitations beyond an abstract idea. *See DDR Holdings, LLC v. Hotels.com*, 113 U.S.P.Q.2d 1097 (Fed. Cir. 2014) (explaining that computer claims [directed to serving web pages] in question amounted to more than simply stating "apply

the abstract idea on the Internet."). Here, the present claims are a significant technique in telephony, and are not merely an abstract idea. The claims, when taken as a whole, do not simply describe context determination as might be performed in the mind of a human. Further, the claims plainly go beyond the mere concept of simply retrieving and combining data using a computer. Rather, claim 22 recites "selecting a … computer application that is relevant to the phone call based on … a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and … data that is machine-learned." (Emphasis added). In this way, the claims improve the technology of telephony, in particular, with respect to the reliability and accuracy of the determined context. Thus, even if the claims encompass an abstract idea, the claims represent more than the abstract idea.

Thus, the Appellants respectfully assert that independent claims 22, 36, and 40 are directed to a process, a manufacture, and a machine, respectively, which are patent eligible subject matter under 35 U.S.C. § 101. For at least the same reasons, claims 23-35, 37-39, and 41, which depend from the independent claims, are also allowable. Therefore, the Appellants respectfully request that the Board reverse the rejection under 35 U.S.C. § 101.

**B. Request for Reversal of the Rejections**

In view of the reasons set forth above, the Appellants respectfully request that the Board reverse the rejections of claims 22-41 under 35 U.S.C. § 101.

**Conclusion**

The Appellants respectfully submit that all pending claims are in condition for allowance. However, if the Examiner or Board wishes to resolve any other issues by way of a telephone conference, the Examiner or Board is kindly invited to contact the undersigned attorney at the telephone number indicated below.

Respectfully submitted,

Date: January 30, 2018

/Barry D. Blount/
Barry D. Blount
Reg. No. 35,069
(832) 375-0200

**CORRESPONDENCE ADDRESS:**
Microsoft Corporation
Patent Group Docketing Dept.
One Microsoft Way
Redmond, WA 98052

8. **APPENDIX OF CLAIMS ON APPEAL**

**Listing of Claims:**

22. A method of providing context to a phone call, comprising:

receiving the phone call;

selecting a first computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and first data and second data that is machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

presenting the first computer application on one or more available devices.

23. The method of claim 22, comprising producing and storing the tracking data associated with the previous phone calls, wherein the tracking data associated with the previous phone calls describes at least one previous intention and at least one previous action.

24. The method of claim 23, wherein the tracking data associated with the previous phone calls describes at least one previous application, at least one previous application used during the previous phone calls, at least one content referenced during the previous phone calls, at least one search performed during the previous phone calls, and at least one note taken during the previous phone calls.

25. The method of claim 22, comprising receiving an identifier of a caller that initiates the phone call.

26. The method of claim 25, wherein the identifier of the caller comprises an email address of the caller.

27. The method of claim 25, wherein the identifier comprises a social media identifier of the caller.

28. The method of claim 22, wherein the intention comprises one of a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, and a commercial communication.

29. The method of claim 22, where the action comprises one of a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, and an edit to a presentation.

30. The method of claim 29, where the communication to make comprises a social media post.

31. The method of claim 22, wherein the tracking data comprises a text-based transcript of the phone call.

32. The method of claim 31, wherein the text-based transcript is produced by a natural language processing (NLP) service.

33. The method of claim 22, comprising selecting one or more devices associated with a recipient of the phone call to run the second computer application.

34. The method of claim 33, wherein the one or more devices are selected based on one or more of a workload of the devices, a proximity of the devices to the recipient of the phone call, and the second computer application.

35. The method of claim 22, where the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

36. A computer-readable storage device storing computer-executable instructions that when executed by a computer processor, cause the computer processor to:

receive a phone call;

select a first computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and first data and second data that is machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

present the first computer application on one or more available devices.

37. The computer-readable storage device of claim 36, wherein the computer-executable instructions cause the computer processor to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises a social media identifier of the caller.

38. The computer-readable storage device of claim 36, wherein the action comprises a communication to make, where the communication to make comprises a text message.

39. The computer-readable storage device of claim 36, wherein the tracking data comprises a text-based transcript of the phone call, and wherein the text-based transcript is produced by a natural language processing (NLP) service.

40. An apparatus, comprising:

a processing unit;

a memory comprising computer-executable code that, when executed by the processing unit, cause the processing unit to:

receive a phone call;

select a first computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and first data and second data machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

present the first computer application on one or more available devices.

41. The apparatus of claim 40, wherein the computer-executable code cause the processing unit to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises an email address of the caller.

9. **EVIDENCE APPENDIX**

None.

10. **RELATED PROCEEDINGS APPENDIX**

None.

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 31640706 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 30-JAN-2018 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 09:55:07 |
| **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 | Appeal Brief Filed | 358721_US_NP_AppealBrief.pdf | 93078<br>ffbfa9d71ff8266333394610302 9a36c719af1f8 | no | 19 |

**Warnings:**

| Information: | |
|---|---|
| Total Files Size (in bytes): | 93078 |

**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/AIA/31 (03-14)
Approved for use through 07/31/2016. 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 displays a valid OMB control number.

# NOTICE OF APPEAL FROM THE EXAMINER TO THE PATENT TRIAL AND APPEAL BOARD

Docket Number (Optional): 358721-US-NP

I hereby certify that this correspondence is being facsimile transmitted to the USPTO, EFS-Web transmitted to the USPTO, or deposited with the United States Postal Service with sufficient postage in an envelope addressed to "Commissioner for Patents, P.O. Box 1450, Alexandria, on Alexandria, VA 22313-1450" [37 CFR 1.8(a)]

on _____.

Signature _____

Typed or printed name _____

In re Application of: Gautam Deora

| Application Number | Filed |
|---|---|
| 14/988,350 | January 5, 2016 |

For: Cross Device Companion Application For Phone

| Art Unit | Examiner |
|---|---|
| 2656 | Tieu, Binh Kien |

Applicant hereby **appeals** to the Patent Trial and Appeal Board from the last decision of the examiner.

The fee for this Notice of Appeal is (37 CFR 41.20(b)(1)) $ 800.00

☐ Applicant asserts small entity status. See 37 CFR 1.27. Therefore, the fee shown above is reduced by 50%, and the resulting fee is: $ _____

☐ Applicant certifies micro entity status. See 37 CFR 1.29. Therefore, the fee shown above is reduced by 75%, and the resulting fee is: $ _____
Form PTO/SB/15A or B or equivalent must either be enclosed or have been submitted previously.

☐ A check in the amount of the fee is enclosed.

☐ Payment by credit card. Form PTO-2038 is attached.

☐ The Director is hereby authorized to charge any fees which may be required, or credit any overpayment to Deposit Account No. _____.

☐ Payment made via EFS-Web.

☐ A petition for an extension of time under 37 CFR 1.136(a) (PTO/AIA/22 or equivalent) is enclosed.
For extensions of time in reexamination proceedings, see 37 CFR 1.550.

**WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.**

I am the

☐ applicant

☑ attorney or agent of record
Registration number 35,069

☐ attorney or agent acting under 37 CFR 1.34
Registration number _____

Signature /Barry D. Blount/

Typed or printed name Barry D. Blount

Telephone Number 832-375-0200

Date "December 5, 2017

**NOTE:** This form must be signed in accordance with 37 CFR 1.33. See 37 CFR 1.4 for signature requirements and certifications. Submit multiple forms if more than one signature is required, see below*.

☑ * Total of 1 forms are submitted.

This collection of information is required by 37 CFR 41.20(b)(1) and 41.31. 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, 1.14 and 41.6. 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.*

# 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.

# Electronic Patent Application Fee Transmittal

| | |
|---|---|
| **Application Number:** | 14988350 |
| **Filing Date:** | 05-Jan-2016 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Attorney Docket Number:** | 358721-US-NP |

Filed as Large Entity

**Filing Fees for Utility under 35 USC 111(a)**

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Basic Filing:** | | | | |
| **Pages:** | | | | |
| **Claims:** | | | | |
| **Miscellaneous-Filing:** | | | | |
| **Petition:** | | | | |
| **Patent-Appeals-and-Interference:** | | | | |
| NOTICE OF APPEAL | 1401 | 1 | 800 | 800 |
| **Post-Allowance-and-Post-Issuance:** | | | | |

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Extension-of-Time:** | | | | |
| **Miscellaneous:** | | | | |
| | | | **Total in USD ($)** | **800** |

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 31126327 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 05-DEC-2017 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 11:50:22 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | yes |
| Payment Type | CARD |
| Payment was successfully received in RAM | $800 |
| RAM confirmation Number | 120517INTEFSW11515200 |
| Deposit Account | |
| Authorized User | |

The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows:

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | Notice of Appeal Filed | 358721_US_NP_NoticeAppeal.pdf | 175602<br>0c5474dd8774129485bd13c0699f97a8ba3879a5 | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 2 | Fee Worksheet (SB06) | fee-info.pdf | 30689<br>08b0a56afd4ea770f5d4fce72e4d59987fc1cdc8 | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | **Total Files Size (in bytes):** | 206291 | | |

**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

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

69316 7590 11/27/2017

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

| NOTIFICATION DATE | DELIVERY MODE |
|---|---|
| 11/27/2017 | 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):

usdocket@microsoft.com
chriochs@microsoft.com

| Applicant-Initiated Interview Summary | Application No. | Applicant(s) | |
|---|---|---|---|
| | 14/988,350 | DEORA ET AL. | |
| | Examiner | Art Unit | |
| | BINH K. TIEU | 2656 | |

All participants (applicant, applicant's representative, PTO personnel):

(1) *BINH K. TIEU*. (3)_____.

(2) *Applicant's Rep. Mr. Barry D. Blount*. (4)_____.

Date of Interview: *21 November 2017*.

Type: ☒ Telephonic ☐ Video Conference
☐ Personal [copy given to: ☐ applicant ☐ applicant's representative]

Exhibit shown or demonstration conducted: ☐ Yes ☒ No.
If Yes, brief description: _____.

Issues Discussed ☒101 ☐112 ☐102 ☐103 ☐Others
(For each of the checked box(es) above, please describe below the issue and detailed description of the discussion)

Claim(s) discussed: *22,36 and 40*.

Identification of prior art discussed: *N/A*.

Substance of Interview
(For each issue discussed, provide a detailed description and indicate if agreement was reached. Some topics may include: identification or clarification of a reference or a portion thereof, claim interpretation, proposed amendments, arguments of any applied references etc...)

*Discussed about the Alice USC 101 rejection on claims 22, 36 and 40. Discussed about the Alice USC 101 rejection to claims which recited a series of steps or acts performed by a single basic generic computer or computing device. Discussed about amendments to claims to resolve 101 rejection by amending claims with a feature performed by an element other than the generic computer. In claim 22, for example, the feature of generating a speech-to-text transcript of the phone call by a cloud service during the phone call should be amended to the claim. Furthermore, Examiner suggested that a inventive concept such as "for saving and reducing an overhead associated with context switching" should be amended to the end of each claims. Please see suggestions of amendment to claims on the separate paper* .

**Applicant recordation instructions:** The formal written reply to the last Office action must include the substance of the interview. (See MPEP section 713.04). If a reply to the last Office action has already been filed, applicant is given a non-extendable period of the longer of one month or thirty days from this interview date, or the mailing date of this interview summary form, whichever is later, to file a statement of the substance of the interview

**Examiner recordation instructions**: Examiners must summarize the substance of any interview of record. A complete and proper recordation of the substance of an interview should include the items listed in MPEP 713.04 for complete and proper recordation including the identification of the general thrust of each argument or issue discussed, a general indication of any other pertinent matters discussed regarding patentability and the general results or outcome of the interview, to include an indication as to whether or not agreement was reached on the issues raised.

☐ Attachment

| /BINH K. TIEU/<br>Primary Examiner, Art Unit 2656 | |
|---|---|

# Summary of Record of Interview Requirements

**Manual of Patent Examining Procedure (MPEP), Section 713.04, Substance of Interview Must be Made of Record**
A complete written statement as to the substance of any face-to-face, video conference, or telephone interview with regard to an application must be made of record in the application whether or not an agreement with the examiner was reached at the interview.

**Title 37 Code of Federal Regulations (CFR) § 1.133 Interviews**
Paragraph (b)

In every instance where reconsideration is requested in view of an interview with an examiner, a complete written statement of the reasons presented at the interview as warranting favorable action must be filed by the applicant. An interview does not remove the necessity for reply to Office action as specified in §§ 1.111, 1.135. (35 U.S.C. 132)

37 CFR §1.2 Business to be transacted in writing.
All business with the Patent or Trademark Office should be transacted in writing. The personal attendance of applicants or their attorneys or agents at the Patent and Trademark Office is unnecessary. The action of the Patent and Trademark Office will be based exclusively on the written record in the Office. No attention will be paid to any alleged oral promise, stipulation, or understanding in relation to which there is disagreement or doubt.

---

The action of the Patent and Trademark Office cannot be based exclusively on the written record in the Office if that record is itself incomplete through the failure to record the substance of interviews.

It is the responsibility of the applicant or the attorney or agent to make the substance of an interview of record in the application file, unless the examiner indicates he or she will do so. It is the examiner's responsibility to see that such a record is made and to correct material inaccuracies which bear directly on the question of patentability.

Examiners must complete an Interview Summary Form for each interview held where a matter of substance has been discussed during the interview by checking the appropriate boxes and filling in the blanks. Discussions regarding only procedural matters, directed solely to restriction requirements for which interview recordation is otherwise provided for in Section 812.01 of the Manual of Patent Examining Procedure, or pointing out typographical errors or unreadable script in Office actions or the like, are excluded from the interview recordation procedures below. Where the substance of an interview is completely recorded in an Examiners Amendment, no separate Interview Summary Record is required.

The Interview Summary Form shall be given an appropriate Paper No., placed in the right hand portion of the file, and listed on the "Contents" section of the file wrapper. In a personal interview, a duplicate of the Form is given to the applicant (or attorney or agent) at the conclusion of the interview. In the case of a telephone or video-conference interview, the copy is mailed to the applicant's correspondence address either with or prior to the next official communication. If additional correspondence from the examiner is not likely before an allowance or if other circumstances dictate, the Form should be mailed promptly after the interview rather than with the next official communication.

The Form provides for recordation of the following information:
- Application Number (Series Code and Serial Number)
- Name of applicant
- Name of examiner
- Date of interview
- Type of interview (telephonic, video-conference, or personal)
- Name of participant(s) (applicant, attorney or agent, examiner, other PTO personnel, etc.)
- An indication whether or not an exhibit was shown or a demonstration conducted
- An identification of the specific prior art discussed
- An indication whether an agreement was reached and if so, a description of the general nature of the agreement (may be by attachment of a copy of amendments or claims agreed as being allowable). Note: Agreement as to allowability is tentative and does not restrict further action by the examiner to the contrary.
- The signature of the examiner who conducted the interview (if Form is not an attachment to a signed Office action)

It is desirable that the examiner orally remind the applicant of his or her obligation to record the substance of the interview of each case. It should be noted, however, that the Interview Summary Form will not normally be considered a complete and proper recordation of the interview unless it includes, or is supplemented by the applicant or the examiner to include, all of the applicable items required below concerning the substance of the interview.

A complete and proper recordation of the substance of any interview should include at least the following applicable items:
1) A brief description of the nature of any exhibit shown or any demonstration conducted,
2) an identification of the claims discussed,
3) an identification of the specific prior art discussed,
4) an identification of the principal proposed amendments of a substantive nature discussed, unless these are already described on the Interview Summary Form completed by the Examiner,
5) a brief identification of the general thrust of the principal arguments presented to the examiner,
   (The identification of arguments need not be lengthy or elaborate. A verbatim or highly detailed description of the arguments is not required. The identification of the arguments is sufficient if the general nature or thrust of the principal arguments made to the examiner can be understood in the context of the application file. Of course, the applicant may desire to emphasize and fully describe those arguments which he or she feels were or might be persuasive to the examiner.)
6) a general indication of any other pertinent matters discussed, and
7) if appropriate, the general results or outcome of the interview unless already described in the Interview Summary Form completed by the examiner.

Examiners are expected to carefully review the applicant's record of the substance of an interview. If the record is not complete and accurate, the examiner will give the applicant an extendable one month time period to correct the record.

**Examiner to Check for Accuracy**

If the claims are allowable for other reasons of record, the examiner should send a letter setting forth the examiner's version of the statement attributed to him or her. If the record is complete and accurate, the examiner should place the indication, "Interview Record OK" on the paper recording the substance of the interview along with the date and the examiner's initials.

Continuation from the Telephone Interview Summary

The following suggestions of amendment to claims 22, 36 and 40 as discussed to resolve 101 rejection based on the proposed amended claim 22:

22. (Currently Amended) A method of providing context to a phone call, comprising:

receiving the phone call;

generating a speech-to-text transcript of the phone call by a cloud service during the phone call;

generating tracking data associated with one or more previous phone calls, ~~wherein the tracking data is generated~~ based on ~~a~~ the speech-to-text transcript ~~of the phone call that is generated by a cloud service during the phone call, and based on~~ first and second data;

machine-learning the first and second data from the tracking data associated with one or more previous phone calls, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call;

selecting a first computer application that is relevant to the phone call based on the tracking data associated with one or more previous phone calls and the phone call; and

presenting the first computer application on one or more available devices for saving and reducing an overhead of context switching.

Similar amendment to claims 36 and 40. With the above suggestions, the proposed amended claim 22 will recite the step that is performed by another element (cloud service) and inventive concept (saving and reducing time…).

UNITED STATES PATENT AND TRADEMARK OFFICE

# USPTO Automated Interview Request (AIR)

Nov 10 2017

This paper requesting to schedule and/or conduct an interview is appropriate because:

This submission is requested to be accepted as an authorization for this interview to communicate via the internet. Recognizing that Internet communications are not secure, I hereby authorize the USPTO to communicate with the undersigned concerning scheduling of the interview via video conference, instant messaging, or electronic mail, and to conduct the interview in accordance with office practice including video conferencing.

Name(s):
Barry D. Blount

S-signature:
/Barry D Blount/

Registration Number:
35069

U.S. Application Number:
14988350

Confirmation Number:
7481

E-mail Address:
barry.blount@iiplg.com

Phone Number:
8323750200

Proposed Time of Interview:
11-21-2017 11:00 AM ET

Prefered Interview Type:
Telephonic

I am the applicant or applicant's representative for this application.

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

69316 7590 10/13/2017

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

| NOTIFICATION DATE | DELIVERY MODE |
|---|---|
| 10/13/2017 | 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):

usdocket@microsoft.com
chriochs@microsoft.com

| Office Action Summary | Application No. 14/988,350 | Applicant(s) DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH K. TIEU | Art Unit 2656 | AIA (First Inventor to File) Status Yes |

*-- 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* MONTHS 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 *06/05/2017*.

☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were 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) *22-41* 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) *22-41* 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).

**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)).

** 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/08a and/or PTO/SB/08b) Paper No(s)/Mail Date *4/27/2017*.

3) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .

4) ☐ Other: _____.



Patent Owner Ex. 2102
Page 60 of 304

## DETAILED ACTION

### *Claim Rejections - 35 USC § 101*

1. 35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

2. Claims 22-41 are rejected under 35 U.S.C. 101 because the claimed invention is directed to a judicial exception (i.e., a law of nature, a natural phenomenon, or an abstract idea) without significantly more.

The framework for determining Patent Subject Matter Eligibility is as follows (for additional guidance, see "2014 Interim Guidance on Patent Subject Matter Eligibility" December 16, 2014 which can be found at (http://www.apo.aov/fdsvs/pkg/FR-2014-12-16/pdf/2014-29414.pdf and http://www.uspto.gov/patent/laws-and-reaulations/examination-policv/2014-interim-guidance-subiect-matter-eliaibilitv): 1) Determination whether the claim is directed to one of the four patent-eligible a statutory categories (i.e. process, machine, manufacture, or composition of matter).

1) Determination whether the claim is directed to one of the four patent-eligible a statutory categories (i.e. process, machine, manufacture, or composition of matter).

2A) Determination whether the claim is directed to a judicial exception (i.e. law of nature, a natural phenomenon, or an abstract idea). Examples of abstract ideas referenced in Alice Corp. include:

- Fundamental economic practices
- Certain methods of organizing human activities

- Ideas, themselves
- Mathematical relationships/formulas

2B) Determination whether any element, or combination of elements, in the claim are sufficient to ensure that the claim amounts to **significantly more** than the judicial exception (i.e. the abstract idea) itself.

Limitations referenced in Alice Corp. that may be enough to qualify as "significantly more" when recited in a claim with an abstract idea include, as non-limiting or non-exclusive examples:

- Improvements to another technology or technical field
- Improvements to the functioning of the computer itself
- Applying the judicial exception with, or by use of, a particular machine
- Effecting a transformation or reduction of a particular article to a different state or thing
- Adding a specific limitation other than what is well-understood, routine and conventional in the field, or adding unconventional steps that confine the claim to a particular useful application
- Other meaningful limitations beyond generally linking the user of the judicial exception to a particular technological environment.

Limitations referenced in Alice Corp. that are not enough to qualify as "significantly more" when recited in a claim with an abstract idea include, as non-limiting or non-exclusive examples:

- Adding the words “apply it” (or an equivalent) with an abstract idea, or mere instructions to implement an abstract idea on a computer
- Simply appending well-understood, routine and conventional activities previously known to the industry, specified at a high level of generality, to the judicial exception, e.g. a claim to an abstract idea requiring no more than a generic computer to perform generic computer functions that are well-understood, routine and conventional activities previously known to the industry.

- Adding insignificant extrasolution activity to the judicial exception, e.g. mere data gathering in conjunction with a law of nature or abstract idea

- Generally linking the user of the judicial exception to a particular technological environment or field of use

Claim 22 is directed to a process or series of acts for providing context to a phone call comprising receiving the phone call; selecting a first second computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call and first data and second data that is machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and presenting the first second computer application on one or more available devices. This concept is similar in concept to those of Court cases in the “Interim Eligibility Guidance Quick Reference Sheet Identifying Abstract Ideas”, which was identified by the courts as an abstract idea (Electric Power Group, SmartGene, and Classen). The claim further recited the feature of wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, which is a conventional step performing long with the feature of receiving the phone call. This conventional step is not an additional element that make the claim eligible or not amount to significantly more than the abstract idea.

According to the Court cases, Electric Power Group, SmartGene and Classen, the step of receiving the phone call along with the tracking data from the cloud service is

mapped to the step of “collecting information” in the Electric Power Group and Classen. Furthermore, the step of electing a first computer application is mapped to the steps of "comparing and analyzing information/data" in the Court cases. Finally, the step of presenting the first computer application on one or more available devices is mapped to the steps of “displaying and identifying results or options” in the Electric Power Group and Smartgene. Therefore, claim 22 does NOT recited any additional elements (left-over) beyond the identified abstract idea which make the claim eligible.

The claim(s) does/do not include additional elements that are sufficient to amount to significantly more than the judicial exception because there are not any additional steps that are not abstract, thus there is no limitation that is “significantly more”. The additional elements or combination of elements in this claim other than the abstract idea per se amounts to no more than (i) mere instructions to implement the idea on a computer, and/or (ii) recitation of generic computer structure that serves to perform generic computer functions that are well understood, routine, and conventional activities previously known to the industry, and thus are not enough to qualify as “significantly more” than the abstract idea itself.

Specifically, receiving information, analyzing information, retrieving information, comparing information, and determining a result are all steps requiring no more than a generic computer (e.g. one or more computers) to perform generic computer functions that are well-understood, routine and conventional activities previously known to the pertinent industry and there is no improvement to another technology or technical

field, no improvements to the functioning of the computer itself, and no meaningful limitations beyond generally linking the use of an abstract idea to a particular technical environment. That is, the computer (i.e., the Device 110, as shown in figures 1 and 2 defined as a computer device, such as a desktop computer, laptop computer, etc.) recited in the specification that is receiving information, analyzing information, retrieving information, comparing information, and determining a result is nothing more than a general purpose computer, wherein a general purpose computer is fully capable of performing the claimed invention since any general purpose computer is capable of receiving information, analyzing information, retrieving information, comparing information, and determining a result. The claimed computer is merely being used as a means of implementing the idea on the computer and is serving to perform generic computer functions. As a result, the computer of the specification that performs the steps of the methods is still considered to be nothing more than a general purpose computer that happens to be the particular means for performing/executing the method, i.e. the abstract idea. Additionally, regarding a processor with basic functionality for comparing stored and input data and rules, to do what people do routinely, the court concluded that these are familiar mental steps performed by or with a computer, and as such the claim was found ineligible (SmartGene, Inc. v. Advanced Biological Labs). As such, the processor is merely a generic processor that can receive, analyze, retrieve, compare and determine.

Further, repeating and/or tracking periodically the steps are considered an insignificant extrasolution activity, including mere data gathering or querying. The court has held data gathering using a scanner is not significantly more than an abstract idea (see Content Extraction and Transmission v. Wells Fargo CAFC 776 f3d 1343 (2014)). As such, the updating and repeating appear to be well-understood, routine, and conventional activities known to the industry, specified at a high level of generality.

Viewed as a whole, these additional claim elements do not provide meaningful limitations to transform the abstract idea into a patent eligible application of the abstract idea such that the claims amount to significantly more than the abstract idea itself.

Regarding claims 36 and 40, Alice Corp. also establishes the same analysis should be used for all categories of claims. Therefore, the system claim 1 is also rejected as ineligible subject matter under 35 U.S.C. 101 for substantially the same reasons as the method claim(s). The components (i.e. processing unit, memory, computer-readable storage device, etc.) add nothing of substance to the underlying abstract idea. At best, the claim merely provides an environment to implement the abstract idea.

Dependent claims 23-35 and 37-39 and 41 are rejected with the reasons as set forth above.

***Allowable Subject Matter***

3. Claims 22-41 are allowed if the independent claims 22, 36 and 40 are amended with an inventive concept (according to step 2B) in order to overcome the Alice U.S.C. 101 rejection as set forth above.

***Response to Arguments***

4. Applicant's arguments filed 06/05/2017 have been fully considered but they are not persuasive.

A/. In response to the Applicants' arguments stated in the first paragraph, page 11 of the remarks, wherein the Applicants stated as followings:

> **"Accordingly, Examiners "must provide an explanation as to why each claim is unpatentable, which must be sufficiently clear and specific." USPTO Memorandum titled "Formulating a Subject Matter Eligibility Rejection and Evaluating the Applicant's Response to a Subject Matter Eligibility Rejection," dated May 4, 2016, p. 2. The explanation as to why a claim is unpatentable should "identify specific claim limitations and explain why those claim limitations set forth a judicial exception (e.g. an abstract idea)." Id. If the Examiner determines that a claim recites an abstract idea, "the rejection should identify the abstract idea as it is recited...and explain why it corresponds to a concept that the courts have identified as an abstract idea."…"**

The Examiner respectfully disagreed with the Applicants' arguments above. In the rejections of claims under Alice USC 101, Examiner clearly determined that the claims were rejected under the Court cases. For examples, in the First Office Action, Examiner rejected the original claim 22 under the Court case of "Smartgene". Applicants should be understood that the process recited in the method claim 22 to be

mapped to a series of acts in the "Smartgene". Also, Applicants can find the mapping of features of the amended claim 22 in above Alice USC. 101 rejection. After mappings, there is no any elements in claim 22 beyond to the series of acts in the Court case, the claim 22 is identified as an abstract idea according to the step 2B. This is very clear that the rejection identified the abstract idea, in claim 22, which was performed as a basic function by a general computer, such as the computing device 110 as defined in the specification which is one of a desktop computer, laptop computer, etc. It is also note that the claim 22 does not recited any improved function(s) of the computer itself or effects an improvement in any other technology or technical field, may be sufficient to transform the abstract idea into a patent- eligible invention.

B/. In response to the Applicants' arguments stated in last paragraph, page 12 wherein the Applicants stated as followings:

> **"Claims 22, 36, and 40 recite a method, a computer-readable medium, and an apparatus, and thus, are directed to a process, a manufacture, and a machine, respectively, which are statutory categories of invention. See 35 U.S.C. § 101. Further, claims 22-41 are not directed to an abstract idea with only mere generic computer implementation, but instead are plainly patent eligible. The claims are directed to providing machine-learned context for a phone call during the phone call. Such does not describe a fundamental economic practice, a method of organizing human activity, or an idea itself (standing alone). Claim 22 recites, "selecting a ... computer application that is relevant to the phone call based on ... a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and ... data that is machine-learned." The claims thus do not merely recite the performance of some practice known from the pre-computer world along with the requirement to perform it on the computer…**

The Examiner respectfully disagrees with the Applicants' arguments above. First of all, the feature of generating the tracking data is based on a speech-to-text transcript of the phone call by a cloud service and the data that is machine-learned is a conventional step with conventional data provided and performed along with the step of receiving the phone call. As noted above, this conventional step is NOT an additional element that make the claim eligible or not amount to significantly more than the abstract idea according to the step 2B.

C/. Applicants continually argued on page 13 as followings:

> **"Additionally, the independent claims recite concepts that are distinct from the types of concepts found by the courts to be abstract. For example, in SmartGene, the Federal Circuit stated, "[B]ased on earlier precedents, this court held that section 101 did not embrace a process defined simply as using a computer to perform a series of mental steps that people, aware of each step, can and regularly do perform in their heads." SmartGene v. ABL (Fed. Cir. 2014) (citing to CyberSource Corp. v. Retail Decisions, Inc., 654 F.3d 1366, 1373 (Fed. Cir. 2011)). However, unlike the collections of data recited in SmartGene, the claims recite data that is machine-learned. It is not possible for a person to "machine-learn" from a transcript generated by a cloud service, especially not during a phone call. Thus, the independent claims recite concepts that are distinct from the types of concepts found by the courts to be abstract."**

The Examiner respectfully disagrees with the Applicants' arguments above. The concept of claim 22 is mapped to each of the Court cases based on the series of acts recited in claim 22, not based on type of data used or implemented in claim 22. Therefore, the concept of claim 22 is similar to the concepts of the Court cases. Also, noticed that the feature of the (tracking) data that is machine-learned from a transcript is well-known technique to those skilled in the art and the feature of receiving the call

along with the machine-learn data is not a new inventive concept that make claim 22 eligible, according to the step 2B.

With all the remarks to the Applicants' arguments, Examiner believed that the previous Office Action, as well as this Final Office Action, have been proper and permissible. Therefore, the Examiner has maintained the Alice USC 101 rejections to all pending claims in this application.

Applicant's arguments with respect to claims 22-41 have been considered but are moot in view of the new ground(s) of rejection.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for response to this final action is set to expire THREE MONTHS from the date of this action. In the event a first response is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event will the statutory period for response expire later than SIX MONTHS from the date of this final action.

**Any response to this final action should be mailed to:**

**Box AF**
**Commissioner of Patents and Trademarks**
**Washington, D.C. 20231**

**Or faxed to:**
**(703) 872-9314 or (571) 273-8300 (for formal communications; Please mark "EXPEDITED PROCEDURE")**

**Or:**
**If it is an informal or draft communication, please label "PROPOSED" or "DRAFT")**

Hand Carry Deliveries to:
Customer Service Window
(Randolph Building)
401 Dulany Street
Alexandria, VA 22314

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Binh K. Tieu whose telephone number is (571) 272-7510, Fax number is (571) 273-7510 and E-mail address: BINH.TIEU@USPTO.GOV.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Email at BINH.TIEU@USPTO.GOV or supervisor, Mr. Curtis Kuntz, can be reached on (571) 272-7499.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (FAIR) 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 FAIR system, see http://pair-direct.uspto.gov. If you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/**BINH K. TIEU**/
Primary Examiner
Technology Division 2656

Date: October 2017

| Notice of References Cited | Application/Control No. 14/988,350 | Applicant(s)/Patent Under Reexamination DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH K. TIEU | Art Unit 2656 | Page 1 of 1 |

**U.S. PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Name | CPC Classification | US Classification |
|---|---|---|---|---|---|---|
| * | A | US-2009/0313553 A1 | 12-2009 | Thornton; James Douglass | H04L29/06027 | 715/751 |
| | B | US- | | | | |
| | C | US- | | | | |
| | D | US- | | | | |
| | E | US- | | | | |
| | F | US- | | | | |
| | G | US- | | | | |
| | H | US- | | | | |
| | I | US- | | | | |
| | J | US- | | | | |
| | K | US- | | | | |
| | L | US- | | | | |
| | M | US- | | | | |

**FOREIGN PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Country | Name | CPC 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.

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | 10/10/2017 | | | | | |
| | 1 | = | = | - | - | | | | | |
| | 2 | = | = | - | - | | | | | |
| | 3 | = | = | - | - | | | | | |
| | 4 | = | = | - | - | | | | | |
| | 5 | = | = | - | - | | | | | |
| | 6 | = | = | - | - | | | | | |
| | 7 | = | = | - | - | | | | | |
| | 8 | = | = | - | - | | | | | |
| | 9 | = | = | - | - | | | | | |
| | 10 | = | = | - | - | | | | | |
| | 11 | = | = | - | - | | | | | |
| | 12 | = | = | - | - | | | | | |
| | 13 | = | = | - | - | | | | | |
| | 14 | = | = | - | - | | | | | |
| | 15 | = | = | - | - | | | | | |
| | 16 | ✓ | = | - | - | | | | | |
| | 17 | O | - | - | - | | | | | |
| | 18 | ✓ | = | - | - | | | | | |
| | 19 | ✓ | = | - | - | | | | | |
| | 20 | O | = | - | - | | | | | |
| | 21 | | = | - | - | | | | | |
| | 22 | | | ✓ | ✓ | | | | | |
| | 23 | | | ✓ | ✓ | | | | | |
| | 24 | | | O | ✓ | | | | | |
| | 25 | | | ✓ | ✓ | | | | | |
| | 26 | | | ✓ | ✓ | | | | | |
| | 27 | | | ✓ | ✓ | | | | | |
| | 28 | | | ✓ | ✓ | | | | | |
| | 29 | | | ✓ | ✓ | | | | | |
| | 30 | | | ✓ | ✓ | | | | | |
| | 31 | | | ✓ | ✓ | | | | | |
| | 32 | | | ✓ | ✓ | | | | | |
| | 33 | | | ✓ | ✓ | | | | | |
| | 34 | | | ✓ | ✓ | | | | | |
| | 35 | | | ✓ | ✓ | | | | | |
| | 36 | | | ✓ | ✓ | | | | | |

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | 10/10/2017 | | | | | |
| | 37 | | | ✓ | ✓ | | | | | |
| | 38 | | | ✓ | ✓ | | | | | |
| | 39 | | | ✓ | ✓ | | | | | |
| | 40 | | | ✓ | ✓ | | | | | |
| | 41 | | | ✓ | ✓ | | | | | |

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| CPC- SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| H04M 2201/40, 2203/251, 2203/352, 2203/353, 3/2209, 1/64, 3/493 | 07/07/2016 | /BKT/ |
| H04L 51/04, 51/32 | 07/07/2016 | /BKT/ |
| G06Q 10/10 | 07/07/2016 | /BKT/ |

| CPC COMBINATION SETS - SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| | | |

| US CLASSIFICATION SEARCHED | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| 379/ | 88.19, 88.2, 93.17, 93.23, 142.01, 142.06, 142.09, 142.14, 142.17, 245, 247 | 07/07/2016 | /BKT/ |
| UPDATED | SEARCHES | 10/29/2016 | /BKT/ |
| 379 | 142.04, | 10/29/2016 | /BKT/ |
| UPDATED | SEARCHES | 03/01/2017 | /BKT/ |
| UPDATED | SEARCHES | 10/10/2017 | /BKT/ |

* See search history printout included with this form or the SEARCH NOTES box below to determine the scope of the search.

| SEARCH NOTES | | |
|---|---|---|
| Search Notes | Date | Examiner |
| WEST DATABASES TERMS SEARCHES | 07/07/2016 | /BKT/ |
| WEST DATABASES TERMS SEARCHES | 03/01/2017 | /BKT/ |
| WEST DATABASES TERMS SEARCHES | 10/10/2017 | /BKT/ |

| INTERFERENCE SEARCH |
|---|

| | |
|---|---|
| | |

| US Class/ CPC Symbol | US Subclass / CPC Group | Date | Examiner |
|---|---|---|---|
| 379 | 142.01, 142.04, 142.14, 142.17 | 10/29/2016 | /BKT/ |



Patent Owner Ex. 2102
Page 76 of 304

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

PTO/SB/08a (03-15)
Approved for use through 07/31/2016. 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 | 14988350 |
| Filing Date | 2016-01-05 |
| First Named Inventor | Gautam Deora |
| Art Unit | 2656 |
| Examiner Name | TIEU, BINH KIEN |
| Attorney Docket Number | 358721-US-NP |

**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 |
|---|---|---|---|---|---|---|
| /BT/ | 1 | 9172795 | B1 | 2015-10-27 | Rathod | |

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 |
|---|---|---|---|---|---|---|
| /BT/ | 1 | 20030063732 | A1 | 2003-04-03 | McKnight | |
| /BT/ | 2 | 20110231773 | A1 | 2011-09-22 | Dhara et al. | |
| /BT/ | 3 | 20130332536 | A1 | 2013-12-12 | Kho et al. | |
| /BT/ | 4 | 20140337751 | A1 | 2014-11-13 | Lim et al. | |
| /BT/ | 5 | 20150128058 | A1 | 2015-05-07 | Anajwala | |

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

**FOREIGN PATENT DOCUMENTS** Remove

# INFORMATION DISCLOSURE STATEMENT BY APPLICANT

**( Not for submission under 37 CFR 1.99)**

| | |
|---|---|
| Application Number | 14988350 |
| Filing Date | 2016-01-05 |
| First Named Inventor | Gautam Deora |
| Art Unit | 2656 |
| Examiner Name | TIEU, BINH KIEN |
| Attorney Docket Number | 358721-US-NP |

| 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 | | | | | | | |

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] |
|---|---|---|---|
| /BT/ | 1 | International Search Report and the Written Opinion of the International Searching Authority, issued in PCT Application No. PCT/US2016/069055, mail date April 7, 2017, 19 pages. (MS # 358721-PCT) | |

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

**EXAMINER SIGNATURE**

| Examiner Signature | /Binh Kien Tieu/ | Date Considered | 10/10/2017 |
|---|---|---|---|

*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 | 14988350 |
| Filing Date | 2016-01-05 |
| First Named Inventor | Gautam Deora |
| Art Unit | 2656 |
| Examiner Name | TIEU, BINH KIEN |
| Attorney Docket Number | 358721-US-NP |

## 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 | /Barry D. Blount/ | Date (YYYY-MM-DD) | 2017-04-27 |
| Name/Print | Barry D. Bloung | Registration Number | 35069 |

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.

# WEST Search History for Application 14988350

## Creation Date: 2017101013:41

## Prior Art Searches

| Query | DB | Hits | Op. | Plur. | Thes. | Date |
|---|---|---|---|---|---|---|
| (business or personal) call | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 3414 | ADJ | YES | | 09-29-2017 |
| (select$3 or choos$3) with computer application | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2933 | ADJ | YES | | 09-29-2017 |
| ((select$3 or choos$3) with computer application ) same ((business or personal) call ) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 1 | ADJ | YES | | 09-29-2017 |
| (select$3 or choos$3) with application | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 819172 | ADJ | YES | | 09-29-2017 |
| ((select$3 or choos$3) with application ) same ((business or personal) call ) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 18 | ADJ | YES | | 09-29-2017 |
| (incoming or inbound)call | PGPB, USPT, USOC, | 103344 | ADJ | YES | | 09-29-2017 |



Patent Owner Ex. 2102
Page 81 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | EPAB, JPAB, DWPI, TDBD | | | | | |
| **((incoming or inbound)call ) same ((select$3 or choos$3) with computer application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 5 | ADJ | YES | | 09-29-2017 |
| **((select$3 or choos$3) with computer application ) same call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 126 | ADJ | YES | | 09-29-2017 |
| **((select$3 or choos$3) with computer application same call ) same related** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 14 | ADJ | YES | | 09-29-2017 |
| **((business or personal) call ) or ((incoming or inbound)call )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 105059 | ADJ | YES | | 09-29-2017 |
| **((business or personal) call or (incoming or inbound)call ) and ((select$3 or choos$3) with computer application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 40 | ADJ | YES | | 09-29-2017 |
| **((select$3 or choos$3) with computer application same (business or personal) call ) or ((select$3 or choos$3) with application same (business or personal) call ) or ((incoming or inbound)call same (select$3 or choos$3) with computer application ) or ((select$3 or choos$3) with computer** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 37 | ADJ | YES | | 09-29-2017 |



Patent Owner Ex. 2102
Page 82 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **application same call same related )** | | | | | | |
| **((business or personal) call or (incoming or inbound)call and (select$3 or choos$3) with computer application ) not ((select$3 or choos$3) with computer application same (business or personal) call or (select$3 or choos$3) with application same (business or personal) call or (incoming or inbound)call same (select$3 or choos$3) with computer application or (select$3 or choos$3) with computer application same call same related )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 34 | ADJ | YES | | 09-29-2017 |
| **previous(call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 20485 | ADJ | YES | | 09-29-2017 |
| **(previous(call or communication or session) ) and ((business or personal) call or (incoming or inbound)call and (select$3 or choos$3) with computer application not (select$3 or choos$3) with computer application same (business or personal) call or (select$3 or choos$3) with application same (business or personal) call or (incoming or inbound)call same (select$3 or choos$3) with computer application or (select$3 or choos$3) with computer application same call same related )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 09-29-2017 |



Patent Owner Ex. 2102
Page 83 of 304

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 |
|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP |

**CONFIRMATION NO. 7481**

69316
MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

**PUBLICATION NOTICE**

*OC000000092575169*

**Title:**Cross Device Companion Application For Phone

**Publication No.**US-2017-0195495-A1
**Publication Date:**07/06/2017

## 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 Public Records Division. The Public Records Division can be reached by telephone at (571) 272-3150 or (800) 972-6382, by facsimile at (571) 273-3250, by mail addressed to the United States Patent and Trademark Office, Public Records Division, 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 https://portal.uspto.gov/pair/PublicPair. Prior to publication, such status information is confidential and may only be obtained by applicant using the private side of PAIR.

Further assistance in electronically accessing the publication, or about PAIR, is available by calling the Patent Electronic Business Center at 1-866-217-9197.

---

Office of Data Managment, 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: Gautam Deora, et al. | § | Confirmation No. | 7481 |
| Serial No.: 14/988,350 | § | Group Art Unit: | 2656 |
| Filed: January 5, 2016 | § | Examiner: | Tieu, Binh Kien |
| For: Cross Device Companion Application For Phone | § | Atty. Docket: | 358721-US-NP |

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

CERTIFICATE OF TRANSMISSION OR MAILING
37 C.F.R. 1.8

I hereby certify that this correspondence is being transmitted by facsimile to the United States Patent and Trademark Office in accordance with 37 C.F.R. § 1.6(d), or is being transmitted via the Office electronic filing system in accordance with 37 C.F.R. § 1.6(a)(4), or is being deposited with the U.S. 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 below:

| June 5, 2017 | /Barry D. Blount/ |
|---|---|
| Date | Barry D. Blount, Reg. No. 35,069 |

Sir:

**AMENDMENT AND RESPONSE TO**
**OFFICE ACTION DATED MARCH 10, 2017**

In response to an Office Action dated March 10, 2017, the Applicants are providing the following Amendment and Response.

The Applicants assert that no fee is due in connection with the filing of this document because no fee is specified in the fee schedule set forth in the Code of Federal Regulations. However, should any fee under 37 C.F.R. §§ 1.16 to 1.21 be deemed necessary for any reason relating to this document, the Commissioner is hereby authorized to deduct said fee from Deposit Account No. 50-4474; Order No. 358721-US-NP. Authorized by Deposit Account user /Barry D. Blount, Reg. No. 35,069/ Barry D. Blount.

## AMENDMENTS TO THE CLAIMS

Please amend claims 22, 36, and 40, as shown below. Pursuant to 37 C.F.R. § 1.121(c), the text of all pending claims, along with their current status, is set forth below.

1-21. (Canceled).

22. (Currently Amended) A method of providing context to a phone call, comprising:

receiving the phone call;

~~receiving first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls;~~

~~receiving second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;~~

selecting a first ~~second~~ computer application that is relevant to the phone call based on [[the]] tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and first data and [[the]] second data that is machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

presenting the first ~~second~~ computer application on one or more available devices.

23. (Previously Presented) The method of claim 22, comprising producing and storing the tracking data associated with the previous phone calls, wherein the tracking data associated with the previous phone calls describes at least one previous intention and at least one previous action.

24. (Previously Presented) The method of claim 23, wherein the tracking data associated with the previous phone calls describes at least one previous application, at least one previous application used during the previous phone calls, at least one content referenced during the previous phone calls, at least one search performed during the previous phone calls, and at least one note taken during the previous phone calls.

25. (Previously Presented) The method of claim 22, comprising receiving an identifier of a caller that initiates the phone call.

26. (Previously Presented) The method of claim 25, wherein the identifier of the caller comprises an email address of the caller.

27. (Previously Presented) The method of claim 25, wherein the identifier comprises a social media identifier of the caller.

28. (Previously Presented) The method of claim 22, wherein the intention comprises one of a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, and a commercial communication.

29. (Previously Presented) The method of claim 22, where the action comprises one of a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, and an edit to a presentation.

30. (Previously Presented) The method of claim 29, where the communication to make comprises a social media post.

31. (Previously Presented) The method of claim 22, wherein the tracking data comprises a text-based transcript of the phone call.

32. (Previously Presented) The method of claim 31, wherein the text-based transcript is produced by a natural language processing (NLP) service.

33. (Previously Presented) The method of claim 22, comprising selecting one or more devices associated with a recipient of the phone call to run the second computer application.

34. (Previously Presented) The method of claim 33, wherein the one or more devices are selected based on one or more of a workload of the devices, a proximity of the devices to the recipient of the phone call, and the second computer application.

35. (Previously Presented) The method of claim 22, where the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

36. (Currently Amended) A computer-readable storage device storing computer-executable instructions that when executed by a computer processor, cause the computer processor to:

receive a phone call;

~~receive first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls, at least one previous intention, and at least one previous action;~~

~~receive second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;~~

select a first ~~second~~ computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and [[the]] first data and [[the]] second data that is machine-learned from the tracking data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

present the first ~~second~~ computer application on one or more available devices.

37. (Previously Presented) The computer-readable storage device of claim 36, wherein the computer-executable instructions cause the computer processor to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises a social media identifier of the caller.

38. (Previously Presented) The computer-readable storage device of claim 36, wherein the action comprises a communication to make, where the communication to make comprises a text message.

39. (Previously Presented) The computer-readable storage device of claim 36, wherein the tracking data comprises a text-based transcript of the phone call, and wherein the text-based transcript is produced by a natural language processing (NLP) service.

40. (Currently Amended) An apparatus, comprising:

a processing unit;

a memory comprising computer-executable code that, when executed by the processing unit, cause the processing unit to:

receive a phone call;

~~receive first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls, at least one previous intention, at least one previous action, and a text-based transcript of the phone call, wherein the text-based transcript is produced by a natural language processing (NLP) service;~~

~~receive second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;~~

select a first ~~second~~ computer application that is relevant to the phone call based on tracking data associated with one or more previous phone calls and the phone call, wherein the tracking data is based on a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and [[the]] first data and [[the]] second data machine-learned from the tracking

data, wherein the first data comprises a type of communication describing the phone call, wherein the second data comprises an action describing a concern of the phone call, and wherein the tracking data comprises a second application used during the previous phone calls; and

present the first ~~second~~ computer application on one or more available devices.

41. (Previously Presented) The apparatus of claim 40, wherein the computer-executable code cause the processing unit to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises an email address of the caller.

## REMARKS

The Applicants are filing this Amendment and Response to an Office Action dated March 10, 2017. At the time of the Office Action, claims 22-41 were pending. In response to the Office Action, the Applicants have amended claims 22, 36, and 40. No new matter has been added by way of these amendments. The amendments are supported in at least paragraphs [0020] and [0033]-[0034]. Upon entry of the amendments, claims 22-41 remain pending. Based on the foregoing amendments and the following remarks, the Applicants respectfully assert that all pending claims are in condition for allowance.

In the Office Action, the Examiner would allow claim 24, if rewritten in independent form including all the limitations of the base claim and any intervening claims. The Examiner's comments on the allowability of this claim is discussed in detail below.

The Examiner rejected claims 22-41 under 35 U.S.C. § 101, asserting that the claimed invention is directed to a judicial exception without significantly more. The Examiner rejected claims 22, 23, 25-29, and 33-38 under 35 U.S.C. § 102(a)(2) as being anticipated by U.S. Patent Application Publication No. 2012/0021730 by Vendrow (hereinafter "Vendrow"). Claim 30 was rejected by the Examiner under 35 U.S.C. § 103 as being unpatentable over Vendrow in view of U.S. Patent Application Publication No. 2016/0134579 by Buddenbaum et al. (hereinafter "Buddenbaum"). Lastly, the Examiner rejected claims 31, 32, and 39-41 under 35 U.S.C. § 103 as being unpatentable over Vendrow in view of U.S. Patent Application Publication No. 2015/0254675 by Kannan et al. (hereinafter "Kannan"). These rejections are discussed in detail below.

**Allowable Subject Matter**

The Applicants gratefully acknowledge the Examiner's recognition of allowable subject matter. More specifically, the Applicants thank the Examiner for indicating that Claim 24 would be allowable but for depending from an otherwise rejected claim. *See* Office Action, p. 12. The Examiner suggests re-writing claim 24 as an independent claim to make the claim allowable. *See id.* However, the Applicants elect not to amend at this time.

**The Rejection Under 35 U.S.C. § 101**

With regard to the rejection of claims 22-41 under 35 U.S.C. § 101, the Examiner specifically stated:

> The claims do not include additional elements that are sufficient to amount to significantly more than the judicial exception because each of the claims 22 and 36 directed to features of receiving first and second data..., comparing/ selecting a second computer application..., and outputting/ presenting the second computer application to one or more available devices. The features recited in claims 22 and 36 are generic computer features … The generic computer functions do not add meaningful limitation to the abstract idea. This concept is similar in concept to that of comparing stored and input data and rules, which was identified by the courts as an abstract idea (SmartGene, Inc. v. Advanced Biological Labs, SA, 555 Fed. Appx. 950 (Fed. Gire. 2014)).
>
> The claim(s) does/do not include additional elements that are sufficient to amount to significantly more than the judicial exception because there are not any additional steps that are not abstract, thus there is no limitation that is "significantly more" …
>
> Dependent claims 23-35 and 37-41 are rejected with the reasons as set forth above.

Office Action, pp. 3-4.

The Examiner has the burden of setting forth a *prima facie* case that the claimed subject matter falls outside of the statutory categories defined in 35 U.S.C. § 101. M.P.E.P. § 2100 (IV)(B). Section 101 states that "[w]hoever invents or discovers any new and useful *process*, *machine*, *manufacture*, or *composition of matter*, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title." 35 U.S.C. § 101 (emphasis added). "In choosing such expansive terms modified by the comprehensive 'any,' Congress plainly contemplated that the patent laws would be given wide scope." *Bilski v. Kappos*, 561 U.S. 593 (2010)). In fact, Congress intended this statute to include "anything under the sun that is made by man." *Diamond v. Chakrabarty*, 447 U.S. 303, 308-09, 206 U.S.P.Q. 193, 197 (1980).

To determine patent eligibility, one must first determine whether the claims are directed to a judicially recognized exception. *See Alice Corp. v. CLS Bank Int'l*, 134 S. Ct. 2347, 2355 (2014). The Supreme Court has "set forth a framework for distinguishing patents that claim laws of nature, natural phenomena, and abstract ideas from those that claim patent-eligible applications of those concepts." *Alice Corp.*, 134 S. Ct. at 2355. As the Supreme Court has made clear, too broad an interpretation of these exclusions from the grant in §101 "could eviscerate patent law." *Id.* (quoting *Mayo Collaborative v. Prometheus Laboratories, Inc.*, 132 S. Ct. 1289, 1293 (2012)). It has long been recognized that an application of an abstract principle, a law of nature, or physical phenomena to a known structure or process may well be deserving of patent protection. *See Diamond v. Diehr*, 450 U.S. 175, 185, 187 (1981); *Research Corp. Technologies v. Microsoft Corp.*, 627 F.3d 859 (Fed. Cir. 2010). After all, "all inventions at some level embody, use, reflect, rest upon, or apply laws of nature, natural phenomena, or abstract ideas." *Mayo Collaborative v. Prometheus Laboratories, Inc.*, 132 S. Ct. 1289, 1293 (2012) (Slip Op. at p. 21).

Accordingly, Examiners "must provide an explanation as to why each claim is unpatentable, which must be sufficiently clear and specific." USPTO Memorandum titled "Formulating a Subject Matter Eligibility Rejection and Evaluating the Applicant's Response to a Subject Matter Eligibility Rejection," dated May 4, 2016, p. 2. The explanation as to why a claim is unpatentable should "identify specific claim limitations and explain why those claim limitations set forth a judicial exception (*e.g.* an abstract idea)." *Id.* If the Examiner determines that a claim recites an abstract idea, "the rejection should identify the abstract idea as it is recited…and explain why it corresponds to a concept that the courts have identified as an abstract idea." *Id.* With regard to software in particular, the Federal Circuit has held that "[s]oftware can make non-abstract improvements to computer technology just as hardware improvements can, and sometimes the improvements can be accomplished through either route." *Enfish, LLC v. Microsoft Corporation, 822 F.3d 1327, 1335 (Fed. Cir. 2016).* (Slip Op. at p. 11).

Moreover, the courts have held that "[w]hether at step one or step two of the *Alice* test, in determining the patentability of a method, a court must look to the claims as an ordered combination, without ignoring the requirement of the individual steps." *McRO, Inc. v. Bandai Namco Games America Inc., 837 F. 3d 1299, 1313 (Fed. Cir. 2016).* Furthermore, courts "'must be careful to avoid oversimplifying the claims' by looking at them generally and failing to account for the specific requirements of the claims." *Id.*

The courts have also held that if a claim is directed to a patent-ineligible concept such as an abstract idea, then "something more" in the claim can transform the claim to a patent-eligible concept to satisfy Section 101. *See Alice Corp. v. CLS Bank Int'l*, 134 S. Ct. 2347, 2354 (2014). For example, in *Alice Corp. v. CLS Bank Int'l*, the Supreme Court held that claims merely requiring generic computer implementation failed to transform an abstract idea into a patent eligible invention. *See id.* However, the Court clarified that claims involving

computer implementation with a patent-ineligible concept such as an abstract idea, that improves the function of the computer itself or effects an improvement in any other technology or technical field, may be sufficient to transform the abstract idea into a patent-eligible invention. *See id.* Again, all inventions generally involve abstract concepts. *See Preliminary Examination Instructions in view of the Supreme Court Decision in Alice Corporation Ply. Ltd. v. CLS Bank International, et al.*, Andrew H. Hirshfeld, Deputy Commissioner for Patent Examination Policy, June 25, 2014. Computer implementation of an abstract idea may be patent eligible for reasons such as: (1) improvements to the functioning of the computer; (2) improvements to another technology or technical fields; and (3) meaningful limitations beyond generally linking the use of an abstract idea to a particular technological environment. *See id.*

***Independent claims 22, 36, and 40 recite patent eligible subject matter.***

Claims 22, 36, and 40 recite a method, a computer-readable medium, and an apparatus, and thus, are directed to a process, a manufacture, and a machine, respectively, which are statutory categories of invention. *See* 35 U.S.C. § 101. Further, claims 22-41 are not directed to an abstract idea with only mere generic computer implementation, but instead are plainly patent eligible. The claims are directed to providing machine-learned context for a phone call during the phone call. Such does not describe a fundamental economic practice, a method of organizing human activity, or an idea itself (standing alone). Claim 22 recites, "selecting a … computer application that is relevant to the phone call based on … a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and … data that is machine-learned." The claims thus do not merely recite the performance of some practice known from the pre-computer world along with the requirement to perform it on the computer. *See DDR Holdings, LLC v. Hotels.com*, 113 U.S.P.Q.2d 1097 (Fed. Cir. 2014) (holding that computer claims involving the Internet were not directed to an abstract idea). Rather, the claims recite limitations related to the technical fields of speech

recognition, machine learning, and the cloud. The Applicants respectfully note that the very nature of machine learning and the cloud inextricably ties these technical fields to computer technology. Further, due to its complexity, speech recognition is also tied to computer technology. Thus, the claims are not abstract.

Additionally, the independent claims recite concepts that are distinct from the types of concepts found by the courts to be abstract. For example, in SmartGene, the Federal Circuit stated, "[B]ased on earlier precedents, this court held that section 101 did not embrace a process defined simply as using a computer to perform a series of mental steps that people, aware of each step, can and regularly do perform in their heads." SmartGene v. ABL (Fed. Cir. 2014) (*citing to* CyberSource Corp. v. Retail Decisions, Inc., 654 F.3d 1366, 1373 (Fed. Cir. 2011)). However, unlike the collections of data recited in SmartGene, the claims recite data that is machine-learned. It is not possible for a person to "machine-learn" from a transcript generated by a cloud service, especially not during a phone call. Thus, the independent claims recite concepts that are distinct from the types of concepts found by the courts to be abstract.

However, even if the claims encompass an abstract idea, claims 22-41 recite features such that the claims are significantly more than an abstract idea. These features include a speech-to-text translation, cloud services, and machine learning, which constitute meaningful limitations beyond an abstract idea. *See DDR Holdings, LLC v. Hotels.com*, 113 U.S.P.Q.2d 1097 (Fed. Cir. 2014) (explaining that computer claims [directed to serving web pages] in question amounted more than simply stating "apply the abstract idea on the Internet."). Here, the present claims are a significant technique in telephony, and are not merely an abstract idea. The claims, when taken as a whole, do not simply describe context determination as might be performed in the mind of a human. Further, the claims plainly go beyond the mere concept of simply retrieving and combining data using a computer. Rather, claim 22 recites

"selecting a … computer application that is relevant to the phone call based on … a speech-to-text transcript of the phone call that is generated by a cloud service during the phone call, and … data that is machine-learned." In this way, the claims improve the technology of telephony, in particular, with respect to the reliability and accuracy of the determined context. Thus, even if the claims encompass an abstract idea, the claims represent more than the abstract idea.

***The Applicants request withdrawal of the rejection under 35 U.S.C. § 101.***

Thus, the Applicants respectfully assert that independent claim 22 is directed to a process, which is patent eligible subject matter under 35 U.S.C. § 101. Claim 22 does not encompass an abstract idea. However, even if claim 22 does encompass an abstract idea, claim 22 effects an improvement in the technical field of telephony, and thus amounts to more than just the abstract idea For at least the same reasons, claims 23, 25-35, 37-39, and 41, which depend from the independent claims, are also allowable. Therefore, the Applicants respectfully request that the Examiner withdraw the rejection under 35 U.S.C. § 101 and allow claims 22-41 to issue.

**Claim Rejection under 35 U.S.C. § 102**

With regard to the rejection of claims 22, 23, 25-29, and 33-38 under 35 U.S.C. § 102(a)(2), the Examiner specifically stated that:

> **Regarding claim 22**, Vendrow teaches a method of providing context to a phone call, comprising:
> receiving the phone call ***(i.e., Call Management System (CMS) 106 receiving an inbound call; para. [0037])*** …
> selecting a second computer application that is relevant to the phone call based on the first data and the second data ***(i.e., depending on types of available communication devices, for examples, application 902 as a softphone application is selected as "panel" or "panels"***

> ***(para. [0049]); another application, such as a host, client, web service-based, etc. is selected (para. [00501) and a video and audio editing application is selected, para. [00601].***

Office Action, pp. 5-6 (Emphasis in original). Independent claim 36 is rejected for similar reasons. *See id.*, pp. 7-8.

Interpretation of the claims must be consistent with the interpretation that those skilled in the art would reach. *See In re Cortright*, 165 F.3d 1353, 1359, 49 U.S.P.Q.2d 1464, 1468 (Fed. Cir. 1999); *see also* M.P.E.P. § 2111. As further explained in Section 2111.01 of the M.P.E.P., the words of the claim must be given their plain meaning unless the Applicants have provided a clear definition in the specification. *See In re Zletz*, 893 F.2d 319, 321, 13 U.S.P.Q.2d 1320, 1322 (Fed. Cir. 1989). Again, the plain meaning refers to an interpretation by those of ordinary skill in the art. *See In re Sneed,* 710 F.2d 1544, 218 U.S.P.Q. 385 (Fed. Cir. 1983).

Anticipation under 35 U.S.C. § 102 can be found only if a single reference shows exactly what is claimed. *Titanium Metals Corp. v. Banner*, 778 F.2d 775, 227 U.S.P.Q. 773 (Fed. Cir. 1985). For a prior art reference to anticipate under 35 U.S.C. § 102, every element of the claimed invention must be identically shown in a single reference. *In re Bond*, 910 F.2d 831,15 U.S.P.Q.2d 1566 (Fed. Cir. 1990). To maintain a proper rejection under 35 U.S.C. § 102, a single reference must teach each and every limitation of the rejected claim. *Atlas Powder v. E.I. duPont de Nemours & Co.*, 750 F.2d 1569, 224 U.S.P.Q. 409 (Fed. Cir. 1984). The prior art reference also must show the *identical* invention *"in as complete* detail *as contained in the ... claim"* to support a *prima facie* case of anticipation. *Richardson* v. *Suzuki Motor Co.*, 868 F.2d 1226, 1236, 9 U.S.P.Q. 2d 1913,1920 (Fed. Cir. 1989) (emphasis added). Accordingly, the Applicants need only point to a single element not found in the

cited reference to demonstrate that the cited reference fails to anticipate the claimed subject matter.

***Claims 22, 23, 25-29, and 33-38 are not anticipated by Vendrow.***

Independent claim 22 recites, inter alia, "selecting a … [relevant] computer application … based on a speech-to-text transcript of the phone call that is generated by a cloud service during the call, and … data that is machine-learned." As recited in claim 22, the data that is machine-learned includes "a type of communication describing the phone call … an action describing a concern of the phone call, and … a second application used during the previous phone calls." Independent claim 36 recites similar features. In contrast, Vendrow does not disclose the selection feature recited in the independent claims. Thus, Vendrow cannot anticipate the present claims.

Vendrow describes a computer system for defining a set of rules that are used to route calls based on a call history. *See* Vendrow, Abstract. The Examiner alleges that, in this way, Vendrow discloses the recited computer application selection. *See* Office Action, p. 5. However, selecting a call routing based on a call history is not the same as the selection recited in the independent claims, which is based on a transcript generated by a cloud service, and machine-learned data. Further, the selection recited in the claims can be based on complex features, i.e., a transcript generated by a cloud service and machine-learned data, that can be generated and considered in the course of the actual phone call. In contrast, Vendrow's selection has no relationship to either a cloud-generated transcript or machine-learned data. Thus, Vendrow does not disclose the selection feature recited in the independent claims.

For at least the reasons discussed above, Vendrow does not disclose all the features of independent claims 22 and 36. Thus, Vendrow cannot anticipate the independent claims.

For at least the same reasons, claims 23, 25-29, 33-35, 37, and 38, which depend from independent claims 22 and 36, are also allowable over Vendrow. Accordingly, the Applicants respectfully request that the Examiner withdraw the rejection under 35 U.S.C. § 102, and allow the claims to issue.

**Claim Rejection under 35 U.S.C. § 103(a)**

The Applicants respectfully traverse the rejection of claim 30 under 35 U.S.C. § 103 as being unpatentable over Vendrow and Buddenbaum.

The burden of establishing a *prima facie* case of obviousness falls on the Examiner. *Ex parte Wolters and Kuypers*, 214 U.S.P.Q. 735 (B.P.A.I. 1979). To establish *prima facie* obviousness of a claimed invention, all the claim limitations must be taught or suggested by the prior art. *In re Royka,* 180 U.S.P.Q. 580 (C.C.P.A. 1974). Although a showing of obviousness under 35 U.S.C. § 103 does not require an express teaching, suggestion or motivation to combine prior art references, such a showing has been described by the Supreme Court as providing a "helpful insight" into the obviousness inquiry. *KSR Int'l. Co. v. Teleflex, Inc.*, No. 04-1350, 550 U.S. 398, 401, 82 U.S.P.Q.2d 1385, 1389 (2007). Moreover, obviousness cannot be established by a mere showing that each claimed element is present in the prior art. *Id.* The Examiner must cite a compelling reason why a person having ordinary skill in the art would combine known elements in order to support a proper rejection under 35 U.S.C. § 103. *Id.*

***Vendrow and Buddenbaum, alone or in any type of combination, fail to disclose all of the elements of claim 30.***

The Applicants respectfully traverse the rejection of claim 30 as being unpatentable over Vendrow and Buddenbaum. Claim 30 ultimately depends from claim 22, which is allowable over Vendrow for at least the reasons discussed above. Thus, for at least the same reasons, claim 30 is also allowable over Vendrow. Further, Buddenbaum does not remedy

the deficiencies of Vendrow, either alone or in any type of combinations. Thus, claim 30 is allowable over the cited references.

Buddenbaum describes, "the use of analytics to determine … key factors prior to a user sending a communication … The analytics may determine content, subject, emotion, relationships, and other relevant details … Any alerts/suggestions provided can be provided in real-time as the person types." Buddenbaum, Abstract. Buddenbaum is concerned with determining relevant details for outgoing communication, e.g., email, text message, social media post, and the like. *See id.* In contrast, the claims recite a received phone call, i.e., an incoming communication. Further, Buddenbaum provides alerts and suggestions in real time, but the alerts and suggestions are based solely on analytics collected prior to the outgoing message being written. In contrast, the claims recite selecting a computer application based in part on data parsed from an ongoing phone call. Because Buddenbaum is not concerned with a phone call, or an incoming communication; and, because Buddenbaum provides suggestions based on previously collected data, instead of data determined from an ongoing phone call, Buddenbaum does not disclose the selection feature recited in the independent claims, alone or in any type of combination with Vendrow.

For at least the reasons discussed above, the cited references, alone or in any sort of hypothetical combinations, fail to disclose all of the elements of claim 30. Therefore, the Applicants respectfully request that the Examiner withdraw the rejection under 35 U.S.C. § 103 and allow the claims to issue.

***Vendrow and Kannan, alone or in any type of combination, fail to disclose all of the elements of claims 31, 32, and 39-41.***

With regard to the rejection of independent claims 31, 32, and 39-41 under 35 U.S.C. § 103(a), the Examiner specifically rejected claim 40 for similar reasons to the rejection of independent claims 22 and 36. *See* Office Action, pp. 10-11.

Independent claim 40 recites features similar to the features of claims 22 and 36, which are allowable over Vendrow, as discussed above. Thus, for at least the same reasons, claim 40 is allowable over Vendrow. Further, Kannan does not remedy the deficiencies of Vendrow, alone or in any type of combination.

Kannan describes personalizing customer interaction experiences. *See* Kannan, Abstract. A customer classification framework is selected based on an input corresponding to a business objective or a customer interaction channel. *See id.* A customer persona type is predicted from a predetermined set of persona types during an interaction on the customer interaction channel. *See id.* "A propensity of the customer to perform at least one action is predicted based on the persona type." *Id.* Kannan is concerned with predicting a customer action during an interaction, not selecting a computer application relevant to an ongoing phone call, as recited in the independent claims. As such, Kannan does not disclose the selection feature recited in the independent claims, alone or in any type of combination with Vendrow.

For at least the reasons discussed above, the cited references, alone or in any type of combinations, fail to disclose all of the elements of independent claims 22, 36, and 40. Accordingly, the independent claims are allowable over these references. For at least the same reasons as discussed above, claims 31, 32, 39, and 41, which depend from the independent claims, are also allowable. Therefore, the Applicants respectfully request that the Examiner withdraw the rejection under 35 U.S.C. § 103 and allow the claims to issue.

***The Applicants respectfully request withdrawal of the rejections under 35 U.S.C. 103(a).***

The cited references relied upon by the Examiner, either alone or in any sort of hypothetical combination; fail to disclose all of the elements of claims 22-41. Accordingly, those claims cannot be rendered obvious by the cited references. The Applicants therefore

respectfully request withdrawal of the rejections under 35 U.S.C. § 103(a). An indication of the allowability of those claims is earnestly solicited.

**Conclusion**

The Applicants respectfully assert that all pending claims are in condition for allowance. However, if the Examiner wishes to discuss any issue regarding the present

application by way of a telephone conference, the Examiner is kindly invited to contact the undersigned attorney at the telephone number indicated below.

Respectfully submitted,

Date: June 5, 2017

/Barry D. Blount/
Barry D. Blount
Reg. No. 35,069
(832) 375-0200

**CORRESPONDENCE ADDRESS:**
Microsoft Corporation
Patent Group Docketing Dept.
One Microsoft Way
Redmond, WA 98052

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 29391789 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 05-JUN-2017 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 11:36:31 |
| **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 | | 358721_US_NP_ResponseNFOA.pdf | 102186<br>d72bbe4e5b6a81fcf7fbb1e53c206297b7cdf420 | yes | 21 |

| | Multipart Description/PDF files in .zip description | | |
|---|---|---|---|
| | **Document Description** | **Start** | **End** |
| | Amendment/Req. Reconsideration-After Non-Final Reject | 1 | 1 |
| | Claims | 2 | 7 |
| | Applicant Arguments/Remarks Made in an Amendment | 8 | 21 |
| **Warnings:** | | | |
| **Information:** | | | |
| | **Total Files Size (in bytes):** | 102186 | |

**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/06 (09-11)
Approved for use through 1/31/2014. OMB 0651-0032
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.

| PATENT APPLICATION FEE DETERMINATION RECORD<br>Substitute for Form PTO-875 | Application or Docket Number<br>14/988,350 | Filing Date<br>01/05/2016 | ☐ 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 **06/05/2017**

| | (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)) | * 20 | Minus | ** 20 | = 0 | X $80 = | 0 |
| Independent (37 CFR 1.16(h)) | * 3 | Minus | ***3 | = 0 | X $420 = | 0 |
| ☐ Application Size Fee (37 CFR 1.16(s)) | | | | | | |
| ☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j)) | | | | | | |
| | | | | | TOTAL ADD'L FEE | 0 |

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.

LIE
SHEILA D. CHAPMAN

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.*

PTO/SB/08a (03-15)
Approved for use through 07/31/2016. 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 | 14988350 |
| Filing Date | 2016-01-05 |
| First Named Inventor | Gautam Deora |
| Art Unit | 2656 |
| Examiner Name | TIEU, BINH KIEN |
| Attorney Docket Number | 358721-US-NP |

**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 | 9172795 | B1 | 2015-10-27 | Rathod | |

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 | 20030063732 | A1 | 2003-04-03 | McKnight | |
| | 2 | 20110231773 | A1 | 2011-09-22 | Dhara et al. | |
| | 3 | 20130332536 | A1 | 2013-12-12 | Kho et al. | |
| | 4 | 20140337751 | A1 | 2014-11-13 | Lim et al. | |
| | 5 | 20150128058 | A1 | 2015-05-07 | Anajwala | |

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

**FOREIGN PATENT DOCUMENTS** Remove

| INFORMATION DISCLOSURE STATEMENT BY APPLICANT ( Not for submission under 37 CFR 1.99) | | |
|---|---|---|
| | Application Number | 14988350 |
| | Filing Date | 2016-01-05 |
| | First Named Inventor | Gautam Deora |
| | Art Unit | 2656 |
| | Examiner Name | TIEU, BINH KIEN |
| | Attorney Docket Number | 358721-US-NP |

| 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 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 | International Search Report and the Written Opinion of the International Searching Authority, issued in PCT Application No. PCT/US2016/069055, mail date April 7, 2017, 19 pages. (MS # 358721-PCT) | |

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 | 14988350 |
| | Filing Date | 2016-01-05 |
| | First Named Inventor | Gautam Deora |
| | Art Unit | 2656 |
| | Examiner Name | TIEU, BINH KIEN |
| | Attorney Docket Number | 358721-US-NP |

**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 | /Barry D. Blount/ | Date (YYYY-MM-DD) | 2017-04-27 |
|---|---|---|---|
| Name/Print | Barry D. Bloung | Registration Number | 35069 |

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:** | 29031025 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 27-APR-2017 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 16:23:43 |
| **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 | Other Reference-Patent/App/Search documents | NPL1.pdf | 3574295<br>05386857a84075c81fbdbd7957eaa3b964e1d83a | no | 19 |

**Warnings:**

| | | | | | |
|---|---|---|---|---|---|
| **Information:** | | | | | |
| 2 | Transmittal Letter | 358721_US_NP_IDSCoverSheet.pdf | 25997<br>c72a7028e7b5ff83f6b615af50879b2f2d4985f8 | no | 3 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 3 | Information Disclosure Statement (IDS) Form (SB08) | 358721_US_NP_SupplementalIDS.pdf | 1035244<br>4aa8c0b942414f9b2fb25740421fea9cfa8a38f3 | no | 4 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | **Total Files Size (in bytes):** | 4635536 | | |

**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.**

# PATENT COOPERATION TREATY

From the INTERNATIONAL SEARCHING AUTHORITY

To:
Minhas, Sandip
MICROSOFT CORPORATION
ATTN: PATENT GROUP DOCKETING (BLDG.8/1000)
One Microsoft Way
Redmond WA 98052-6399
ETATS-UNIS D'AMERIQUE

# 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)*: 7 April 2017 (07-04-2017) |
| Applicant's or agent's file reference: 358721-PCT | **FOR FURTHER ACTION** See paragraphs 1 and 4 below |
| International application No.: PCT/US2016/069055 | International filing date *(day/month/year)*: 29 December 2016 (29-12-2016) |
| Applicant: MICROSOFT TECHNOLOGY LICENSING, LLC | |

1. [X] 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.

   **How?** Directly to the International Bureau of WIPO, 34 chemin des Colombettes 1211 Geneva 20, Switzerland, Fascimile 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 applicant's 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. These comments will be made available to the public after international publication. 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.

   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.

   Within **19 months from the priority date, the applicant may request that a supplementary international search be carried out** by a different International Searching Authority that offers this service (Rule 45*bis*.1). The procedure for requesting supplementary international search is described in the *PCT Applicant's Guide*, International Phase, paragraphs 8.006-8.032.

| Name and mailing address of the International Searching Authority | Authorized officer |
|---|---|
| European Patent Office, P.B. 5818 Patentlaan 2<br>NL-2280 HV Rijswijk<br>Tel. (+31-70) 340-2040<br>Fax: (+31-70) 340-3016 | VAN RIJSSEL, Debbie<br>Tel: +31 (0)70 340-4719 |

Form PCT/ISA/220 (July 2014)

# PATENT COOPERATION TREATY

# PCT

## INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

| Applicant's or agent's file reference | **FOR FURTHER ACTION** | see Form PCT/ISA/220 as well as, where applicable, item 5 below. |
|---|---|---|
| 358721-PCT | | |
| International application No. | International filing date *(day/month/year)* | (Earliest) Priority Date *(day/month/year)* |
| PCT/US2016/069055 | 29 December 2016 (29-12-2016) | 5 January 2016 (05-01-2016) |
| Applicant | | |
| MICROSOFT TECHNOLOGY LICENSING, 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 4 sheets.

[X] 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:
      [X] 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,**
   [X] 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,**
   [X] 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
      [X] 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

# INTERNATIONAL SEARCH REPORT

International application No
PCT/US2016/069055

A. CLASSIFICATION OF SUBJECT MATTER
INV. H04M1/57 H04M3/42 H04M1/725 H04M1/247 H04M1/64
H04M1/656 H04M1/658 H04M1/82 H04M3/436 G06F3/00
G06F17/20 G10L15/00 G10L15/22 G10L15/26 G06F3/0484

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

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 practicable, search terms used)
EPO-Internal, WPI Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

| Category* | Citation of document, with indication, where appropriate, of the relevant passages | Relevant to claim No. |
|---|---|---|
| X | US 2011/231773 A1 (DHARA KRISHNA KISHORE [US] ET AL) 22 September 2011 (2011-09-22)<br>abstract<br>figures 4-7<br>paragraph [0032] - paragraph [0043]<br>----- | 1-10 |
| A | US 2014/337751 A1 (LIM MELISSA [US] ET AL) 13 November 2014 (2014-11-13)<br>abstract<br>paragraph [0027] - paragraph [0030]<br>paragraph [0052] - paragraph [0054]<br>----- | 1,10 |
| A | US 2003/063732 A1 (MCKNIGHT RUSSELL F [US]) 3 April 2003 (2003-04-03)<br>abstract<br>figure 2<br>paragraph [0009]<br>----- | 1,10 |
| | -/-- | |

[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 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 |
|---|---|
| 31 March 2017 | 07/04/2017 |

| Name and mailing address of the ISA/ | Authorized officer |
|---|---|
| European Patent Office, P.B. 5818 Patentlaan 2<br>NL - 2280 HV Rijswijk<br>Tel. (+31-70) 340-2040,<br>Fax: (+31-70) 340-3016 | Papadakis, Georgios |

3

Form PCT/ISA/210 (second sheet) (April 2005)

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 2015/128058 A1 (ANAJWALA SARANGKUMAR JAGDISHCHANDRA [IN]) 7 May 2015 (2015-05-07) abstract paragraph [0004] - paragraph [0019] | 1-10 |
| A | US 9 172 795 B1 (RATHOD AMIT NANDKISHORE [IN]) 27 October 2015 (2015-10-27) the whole document | 1-10 |
| A | US 2013/332536 A1 (KHO NANCY ELLEN [US] ET AL) 12 December 2013 (2013-12-12) abstract figures 3, 4, 6 paragraph [0036] - paragraph [0048] paragraph [0050] | 1-10 |

# INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No
PCT/US2016/069055

| Patent document cited in search report | Publication date | Patent family member(s) | Publication date |
|---|---|---|---|
| US 2011231773 A1 | 22-09-2011 | CN 102193972 A | 21-09-2011 |
| | | DE 102011014130 A1 | 27-10-2011 |
| | | DE 102011014232 A1 | 10-11-2011 |
| | | GB 2479046 A | 28-09-2011 |
| | | US 2011228922 A1 | 22-09-2011 |
| | | US 2011231396 A1 | 22-09-2011 |
| | | US 2011231409 A1 | 22-09-2011 |
| | | US 2011231773 A1 | 22-09-2011 |
| | | US 2013304924 A1 | 14-11-2013 |
| | | US 2016005005 A1 | 07-01-2016 |
| US 2014337751 A1 | 13-11-2014 | CN 105229565 A | 06-01-2016 |
| | | EP 2997441 A2 | 23-03-2016 |
| | | US 2014337751 A1 | 13-11-2014 |
| | | WO 2014186303 A2 | 20-11-2014 |
| US 2003063732 A1 | 03-04-2003 | EP 1298895 A2 | 02-04-2003 |
| | | JP 2003152859 A | 23-05-2003 |
| | | US 2003063732 A1 | 03-04-2003 |
| US 2015128058 A1 | 07-05-2015 | NONE | |
| US 9172795 B1 | 27-10-2015 | US 9172795 B1 | 27-10-2015 |
| | | WO 2016022737 A1 | 11-02-2016 |
| US 2013332536 A1 | 12-12-2013 | US 2013329876 A1 | 12-12-2013 |
| | | US 2013332536 A1 | 12-12-2013 |

**Information on Search Strategy** - Pilot phase (see OJ 2015, A86)
The type of information contained in this sheet may change during the pilot for improving the usefulness of this new service.

Application Number
PCT/US2016/069055

TITLE: CROSS DEVICE COMPANION APPLICATION FOR PHONE

APPLICANT: MICROSOFT TECHNOLOGY LICENSING, LLC

IPC CLASSIFICATION: H04M1/57, H04M3/42, H04M1/725, H04M1/247, H04M1/64, H04M1/656, H04M1/658, H04M1/82, H04M3/436, G06F3/00, G06F17/20, G10L15/00, G10L15/22, G10L15/26, G06F3/0484, H04L29/12, H04L29/08, H04W8/26

EXAMINER: Papadakis, Georgios

CONSULTED DATABASES: WPI, EPODOC, ANSERA

CLASSIFICATION SYMBOLS DEFINING EXTENT OF THE SEARCH:

IPC:

CPC: H04M1/575, H04M1/72583/LOW, H04M1/72597/LOW

FI/F-TERMS:

KEYWORDS OR OTHER ELEMENTS FEATURING THE INVENTION:
call context
call transcript
speech recognition
machine learning
call relevant documents
call relevant application

EPO FORM P04A42

# PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

To:

see form PCT/ISA/220

# PCT

## WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43*bis*.1)

Date of mailing
*(day/month/year)* see form PCT/ISA/210 (second sheet)

Applicant's or agent's file reference
see form PCT/ISA/220

**FOR FURTHER ACTION**
See paragraph 2 below

| International application No. | International filing date *(day/month/year)* | Priority date *(day/month/year)* |
|---|---|---|
| PCT/US2016/069055 | 29.12.2016 | 05.01.2016 |

International Patent Classification (IPC) or both national classification and IPC
INV. H04M1/57 H04M3/42 H04M1/725 H04M1/247 H04M1/64 H04M1/656 H04M1/658 H04M1/82 H04M3/436 G06F3/00 G06F17/20 G10L15/00 G10L15/22 G10L15/26 G06F3/0484 H04L29/12 H04L29/08 H04W8/26

Applicant
MICROSOFT TECHNOLOGY LICENSING, 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 and 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 usually 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 notifed 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: | Date of completion of this opinion | Authorized Officer |
|---|---|---|
| European Patent Office<br>P.B. 5818 Patentlaan 2<br>NL-2280 HV Rijswijk - Pays Bas<br>Tel. +31 70 340 - 2040<br>Fax: +31 70 340 - 3016 | see form PCT/ISA/210 | Papadakis, Georgios<br>Telephone No. +31 70 340-0 |

Form PCT/ISA/237 (Cover Sheet) (January 2015)

**Box No. I Basis of the 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:

   a. ☐ forming part of the international application as filed:

      ☐ in the form of an Annex C/ST.25 text file.

      ☐ on paper or in the form of an image file.

   b. ☐ furnished together with the international application under PCT Rule 13*ter*.1(a) for the purposes of international search only in the form of an Annex C/ST.25 text file.

   c. ☐ furnished subsequent to the international filing date for the purposes of international search only:

      ☐ in the form of an Annex C/ST.25 text file (Rule 13*ter*.1(a)).

      ☐ on paper or in the form of an image file (Rule 13*ter*.1(b) and Administrative Instructions, Section 713).

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 forming part of the application as filed or does not go beyond the application as filed, as appropriate, were furnished.

5. Additional comments:

**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) | Yes: | Claims | 1-10 |
| | No: | Claims | |
| Inventive step (IS) | Yes: | Claims | |
| | No: | Claims | 1-10 |
| Industrial applicability (IA) | Yes: | Claims | 1-10 |
| | No: | Claims | |

2. Citations and explanations

**see separate sheet**

**Box No. VII Certain defects in the international application**

The following defects in the form or contents of the international application have been noted:

**see separate sheet**

1 **Re Item V**

Reference is made to the following documents:

D1 US 2011/231773 A1 (DHARA KRISHNA KISHORE [US] ET AL) 22 September 2011 (2011-09-22)

D2 US 2014/337751 A1 (LIM MELISSA [US] ET AL) 13 November 2014 (2014-11-13)

D3 US 2003/063732 A1 (MCKNIGHT RUSSELL F [US]) 3 April 2003 (2003-04-03)

D4 US 2015/128058 A1 (ANAJWALA SARANGKUMAR JAGDISHCHANDRA [IN]) 7 May 2015 (2015-05-07)

1.1 The present application does not meet the criteria of Article 33(1) PCT, because the subject-matter of claims 1, 10 does not involve an inventive step in the sense of Article 33(3) PCT.

1.1.1 Claim 1: D1 discloses a computerized method, comprising:

• receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call (fig. 6: step 602);

• receiving first data that describes an intention associated with the phone call (see feature below);

• receiving second data that describes an action associated with the phone call (see feature below);

• presenting third data that describes the caller, where the third data is based, at least in part, on the identifier (fig 6 step 602: context of phone call; §[0027]: *"However, the example below is described in the just-in-time context of an incoming communication. Just-in-time context can be determined based on one or more of a caller, a recipient, a time of day, a scheduled event, a previous communication, document contents, address books, location, and so forth. In one illustrative example, a caller makes a telephone call to a recipient. The recipient's telephone or other communication device identifies the caller and examines the recipient's previous interactions with the caller"*);

• selecting a computer application that is relevant to the phone call based, at

least in part, on the first data and the second data (fig 6: step 604 and 606: identifying and retrieving on resource based on the context: §[0045]: *"resources can include a document, an agenda, a web page"*, each one of the disclosed presented implies a corresponding application);

• presenting the computer application on one or more devices available to a recipient of the phone call (fig 6: step 608, presenting the resource);

• selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data (fig 6: step 604 and 606: identifying and retrieving on resource based on the context: §[0045]: *"resources can include a document, an agenda, a web page"*);

• presenting the electronic content to the recipient using one or more members of the one or more devices (fig 6: step 608, presenting the resource);

~~• selectively producing fourth data that describes an action to be performed after the phone call is terminated;~~

~~• selectively presenting the fourth data; and~~

~~• selectively storing the fourth data~~.

The subject-matter of claim 1, differs from D1 in that according to claim 1 the method is *selectively producing fourth data that describes an action to be performed after the phone call is terminated, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit, where the communication to make is a phone call, an email, a text, or a social media post; selectively presenting the fourth data; selectively storing the fourth data;*

The objective technical problem to be solved may be regarded as how to *provide automated secretariat services to the callee.*

However, such a solution proposed by claim 1 to the above posed problem is common in the art (see e.g. D2: §§[0028], [0029], [0054]; D3: §[0009]). Since D1 is also concerned about providing similar automated services to the callee, the incorporation of this well-known feature would be straightforward to the skilled person.

Therefore, the subject-matter of claim 1 is not considered inventive within the meaning of Article 33(3) PCT.

1.1.2 Claim 10: D1 discloses a computer-readable storage device storing computer-executable instructions that when executed by a computer control the computer to perform a method, the method comprising:

• receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call (fig. 6: step 602), ~~where the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, and a social media identifier of the caller~~;

• receiving a ~~text-based~~ transcript of the phone call , ~~w~~here the text-based transcript is produced by a natural language processing (NLP) service ~~operating in the cloud~~;

• receiving first data that describes an intention associated with the phone call, ~~where the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication~~, where the first data is selected from the text-based transcript (see feature below);

• receiving second data that describes an action associated with the phone call, where the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation, where the second data is selected from the text-based transcript (fig 6 step 602 or fig 7 step 702 (the embodiments are linked see §[0041]): context of phone call; §[0027]: *"However, the example below is described in the just-in-time context of an incoming communication. Just-in-time context can be determined based on one or more of a caller, a recipient, a time of day, a scheduled event, a previous communication, document contents, address books, location, and so forth. In one illustrative example, a caller makes a telephone call to a recipient. The recipient's telephone or other communication device identifies the caller and examines the recipient's previous interactions with the caller";* §[0042]: speech recognition is used to create and update the

communication context that is used in the future conversations, see also last feature below);

• presenting third data that describes the caller, where the third data is based, at least in part, on the identifier, where the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller (see fig. 4);

• selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data, where the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application (fig 6: step 604 and 606: identifying and retrieving on resource based on the context: §[0045]: *"resources can include a document, an agenda, a web page"*, each one of the disclosed presented implies a corresponding application);

• presenting the computer application on one or more devices available to a recipient of the phone call, where the one or more devices include a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient (fig 6: step 608, presenting the resource; §[0032]: presenting data on tablet or desktop computer), where a member of the one or more devices is selected to present the electronic content or to run the computer application ~~based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application~~;

• selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data, where the piece of content relevant to the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt (fig 6: step 604 and 606: identifying and retrieving on resource based on the context: §[0045]: *"resources can include a document, an agenda, a web page"*);

• presenting the electronic content to the recipient using one or more members of the one or more devices (fig 6: step 608, presenting

the resource);

~~• selectively producing fourth data that describes an action to be performed after the phone call is terminated, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit, where the communication to make is a phone call, an email, a text, or a social media post;~~

~~• selectively presenting the fourth data;~~

~~• selectively storing the fourth data;~~

• producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call, a content referenced during the phone call, a search performed during the phone call, or a note taken during the phone call (fig 7,:steps 704-706, see also feature below), and

• presenting the tracking data to a machine learning process that adapts how the NLP service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call (fig §§[0039], [0042]: the system learns and adapts in order to select a future context, based on resources associated with the phonecall gathered also using speech processing. See also §§[0027], [0028], [0032]).

The subject-matter of claim 10 differs from D1 in that according to claim 1:

(i) The identifier of the caller includes *a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, and a social media identifier of the caller,* which may be regarded to solve the objective technical problem of *selecting the types of data to identify the caller to the callee.*

(ii) The call transcript *is saved in text based format,* which may be regarded to solve the objective technical problem of *selecting the data type to save the collected call resources (transcript data).*

(iii) The Natural Language Processing Service *is located in the cloud,* which may be regarded to solve the objective technical problem of *selecting where to implement the aforementioned service.*

(iv) The first data describes whether the phone call *is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication* which relates to non technical considerations regarding the call context.

(v) The member of the one or more devices which is selected to present the electronic content or to run the computer application *is based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application*, which may be regarded to solve the objective technical problem of *selecting the device to present the aforementioned application to the callee.*

(vi) *Selectively producing fourth data that describes an action to be performed after the phone call is terminated, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit, where the communication to make is a phone call, an email, a text, or a social media post; selectively presenting the fourth data; selectively storing the fourth data;* which may be regarded to solve the objective technical problem of *providing automated secretariat services to the callee.*

No synergistic technical effect arises from any combination of the above differences (i)-(vi), which are considered as a mere juxtaposition of features. Therefore, they are treated independently for assessing inventive step.

Re feature (i): The above mentioned data types are commonly used telephone contact data types, the use of them as caller identifiers does not involve an inventive step.

Re feature (ii): A text based format (e.g. xml, see also D4: §[0035]) is very common in storing call logs, and does not involve an inventive step.

Re feature (iii): It is common to have a remote data processing service located in the cloud. D1 (see fig. 5) already discloses the communication context server being in the cloud, also hinting in the solution proposed by claim 10.

Re feature (iv): The claimed non technical features do not contribute to a solution of a technical problem and therefore neither to the presence of an inventive step.

Re feature (v): D1 already discloses that the content and the application may be presented in to any of a plurality of different devices. The proposed criteria in order to select the device, are considered obvious logical design choices for the skilled person that do not involve an inventive step.

Re feature (vi): Same arguments as for difference in §1.1.1 above apply, mutatis mutandis.

Since, according to the above analysis, none of the differences (i)-(vi) is considered to provide an inventive contribution over D1, the subject-matter of claim 1 is therefore not considered inventive within the meaning of Article 33(3) PCT.

1.2 Dependent claims 2-9 do not appear to contain any additional features which, in combination with the features of any claim to which they refer, meet the requirements of the PCT in respect of inventive step (Article 33(3) PCT), the reasons being as follows:

1.2.1 Claims 2-9: All the claimed features have already been discusses with respect to claim 10, see §1.1.2 above.

2 **Re Item VII**

Furthermore, the following deficiencies are mentioned:

2.1 Contrary to the requirements of Rule 5.1(a)(ii) PCT, the relevant background art disclosed in D1, D4-D6 is not mentioned in the description, nor are these documents identified therein.

2.2 Independent claims 1, 10 are not in the two-part form in accordance with Rule 6.3(b) PCT, with those features known in combination from the prior art being placed in the preamble (Rule 6.3(b)(i) PCT) and the remaining features being included in the characterising part (Rule 6.3(b)(ii) PCT).

2.3 The features of the claims are not provided with reference signs placed in parentheses (Rule 6.2(b) PCT).

## Possible steps after receipt of the international search report (ISR) and written opinion of the International Searching Authority (WO/ISA)

**General information**

For all international applications, the competent International Searching Authority **(ISA)** will establish an international search report **(ISR)** accompanied by a written opinion of the International Searching Authority **(WO/ISA)**. The **WO/ISA** may be responded to by

- filing informal comments with the **International Bureau of WIPO (IB)** (where no demand for international preliminary examination **(demand)** is filed)
- filing amendments under Art. 19 PCT (this can be done whether or not a **demand** is filed)
- filing amendments under Art. 34 PCT and/or formal observations in response to objections raised in the **WO/ISA** (where a **demand** *is* actually filed)

This document explains these possibilities.

**Filing informal comments**

After receipt of the **ISR and WO/ISA**, the applicant may file informal comments on the **WO/ISA, directly with the IB** (see International Search and Preliminary Examination Guidelines 2.15). These will be communicated to the designated/elected Offices, together with the International Preliminary Report on Patentability **(IPRP)** at 30 months from the priority date.

**Amending claims under Art. 19 PCT**

The applicant may file **amended claims** under Art. 19 PCT, **directly with the IB** by the later of the following dates:

- 2 months from the date of mailing of the **ISR** and the **WO/ISA**
- 16 months from the priority date

**However**, any such amendment received by the **IB** after the expiration of the applicable time limit shall be **considered to have been received on time** by the **IB**, if it reaches it **before** the technical preparations for international publication have been completed (the 15th day prior to the date of publication, see PCT Applicant's Guide, International Phase, 9.013).

For further information, please see Rule 46 PCT as well as form PCT/ISA/220.

Please also note that, when filing amended claims under Art. 19 PCT, such amendments shall be **accompanied by a letter** identifying the amendments made and also the basis for the amendments in the application as originally filed (Rule 46.5(b) PCT). Where a **demand** is filed, failure to comply with this requirement may result in the amendments being ignored in the International Preliminary Examination Report **(IPER)**, see Rule 70.2(c-*bis*) PCT.

**Filing a demand for international preliminary examination**

In principle, the **WO/ISA** will be considered to be the written opinion of the International Preliminary Examining Authority (**IPEA**). Where the **WO/ISA** issued by the **EPO** as **ISA** gives a positive opinion on the international application and the invention to which it relates, filing a **demand** with the **EPO** as **IPEA** would normally be unnecessary, since a positive IPRP would anyway be established by the IB based on the WO/ISA (see also further below).

If the applicant wishes to file a **demand** (for example, to allow him to argue his case in international preliminary examination with regard to objections raised in a negative **WO/ISA** before the **IPEA** issues an **IPER**), this must be done before expiration of **3 months after the date of mailing of the ISR and WO/ISA** or **22 months after priority date,** whichever expires later (Rule 54*bis* PCT). Amendments under Art. 34 PCT can be filed with the IPEA, normally at the same time as filing the demand (Rule 66.1(b) PCT) or within the time limit set for reply to any written opinion issued during international preliminary examination by the **IPEA**.

If a **demand** is filed at the **EPO** as **IPEA** and no comments/amendments have been received by the time the **EPO** starts drawing up the **IPER** (Rule 66.4*bis* PCT), the **WO/ISA** will be transformed by the **IPEA** into an **IPER** (also called the **IPRP (Chapter II)** which would merely reflect the content of the **WO/ISA** (OJ 10/2011, 532). The **demand** can still be withdrawn (Art. 37 PCT).

Please also note that, when filing amendments under Art. 34 PCT, such amendments shall be accompanied by a letter which identifies the amendments made and also the basis for the amendments in the application as originally filed (Rule 66.8(a) PCT). Failure to comply with this requirement may result in the amendments being ignored in the **IPER (IPRP (Chapter II))**, see Rule 70.2(c-*bis*) PCT.

---

**Filing a request for supplementary international search**

The applicant may, with the **IB**, file a request for **supplementary international search** under Rule 45*bis*.1 PCT. The present **ISR** and **WO/ISA** may also be taken into account in the execution of that supplementary international search, provided that these are available to the Authority charged with this task before it starts the supplementary search (Rule 45*bis*.5 PCT).

This kind of request **cannot be filed specifying the ISA** who did the **international search**.

More information on this topic can be found in the **PCT Applicant's Guide**, Chapter 8 (http://www.wipo.int/pct/en/guide/ip08.html).

---

**End of the International phase**

Where no **demand** is filed, at the end of the international phase, the **IB** will transform the **WO/ISA** into the IPRP (PCT Chapter I) (Rule 44*bis* PCT), which will then be transmitted together with possible informal comments to the designated Offices. Where a demand is filed, the **WO/ISA** is not transformed into an **IPRP (Chapter I)** by the **IB**, but rather the **IPEA** will establish an **IPER**, (the IPER is the same as the IPRP (PCT Chapter II), see Rule 70.15 PCT).

---

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

| | | | |
|---|---|---|---|
| First Named Inventor: | Gautam Deora | Attorney Docket No.: | 358721-US-NP |
| Application No.: | 14/988,350 | Group Art Unit: | 2656 |
| Filed: | January 5, 2016 | Confirmation Number: | 7481 |
| Customer No.: | 69316 | Examiner: | Tieu, Binh Kien |

Title: Cross Device Companion Application For Phone

Commissioner for Patents
P.O. Box 1450
Alexandria VA 22313-1450

STATEMENT FILED PURSUANT TO
THE DUTY OF DISCLOSURE UNDER 37 C.F.R. §§ 1.56, 1.97 AND 1.98

Commissioner:

Pursuant to the duty of disclosure under 37 C.F.R. §§ 1.56, 1.97 and 1.98, the Applicants request consideration of this Information Disclosure Statement.

PART I: Compliance with 37 C.F.R. § 1.97

This Information Disclosure Statement is being filed after the issuance of Non-Final office action.

No fee or certification is required.

PART II: Additional Information

The Applicants hereby make the following additional information of record in the above-identified application.

| Serial No. | Filing Date | Inventor(s) |
|---|---|---|
| N/A | N/A | N/A |



Patent Owner Ex. 2102
Page 134 of 304

PART III: Remarks

The Applicants hereby make of record in the above-identified application the information listed on the attached form PTO/SB/08A. The order of presentation of the references should not be construed as an indication of the importance of the references. Documents cited on the attached form PTO/SB/08A are enclosed unless otherwise indicated. It is respectfully requested that:

1. The Examiner consider completely the cited information, along with any other information, in reaching a determination concerning the patentability of the present claims;

2. The enclosed form PTO/SB/08A be signed by the Examiner to evidence that the cited information has been fully considered by the Patent and Trademark Office during the examination of this application;

3. The citations for the information be printed on any patent which issues from this application.

By submitting this Information Disclosure Statement, the Applicants make no representation that a search has been performed, of the extent of any search performed, or that more relevant information does not exist.

By submitting this Information Disclosure Statement, the Applicants make no representation that the information cited in the Statement is, or is considered to be, material to patentability as defined in 37 C.F.R. § 1.56(b).

By submitting this Information Disclosure Statement, the Applicants make no representation that the information cited in the Statement is, or is considered to be, in fact, prior art as defined by 35 U.S.C. § 102.



Patent Owner Ex. 2102
Page 135 of 304

Notwithstanding any statement by the Applicants, the Applicants urge the Examiner to form his or her own conclusion regarding the relevance of the cited information. An early and favorable action is hereby requested.

Respectfully submitted,

Date: April 27, 2017

By: /Barry D. Blount/

Barry D. Blount

Reg. No. 35,069

Microsoft Technology Licensing, LLC

One Microsoft Way

Redmond WA 98052-6399

Direct telephone (425) 707-9382

CERTIFICATE OF MAILING OR TRANSMISSION
(Under 37 CFR § 1.8(a)) or ELECTRONIC FILING

I hereby certify that this correspondence is being electronically deposited with the USPTO via EFS-Web on the date shown below:

April 27, 2017
Date

/Victoria Kubitskey/
Signature

Victoria Kubitskey
Printed Name



Patent Owner Ex. 2102
Page 136 of 304

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

69316 7590 03/10/2017

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

| NOTIFICATION DATE | DELIVERY MODE |
|---|---|
| 03/10/2017 | 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):

usdocket@microsoft.com
chriochs@microsoft.com

| Office Action Summary | Application No. 14/988,350 | Applicant(s) DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | AIA (First Inventor to File) Status Yes |

*-- 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* MONTHS 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 *02/02/2017*.

☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were 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) *22-41* 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) *22, 23 and 25-41* is/are rejected.

8)☒ Claim(s) *24* 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).

**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)).

** 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/08a and/or PTO/SB/08b) Paper No(s)/Mail Date _____.

3) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .

4) ☐ Other: _____.

## DETAILED ACTION

### *Continued Examination Under 37 CFR 1.114*

1. A request for continued examination 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 02/02/2017 has been entered.

### *Response to Amendment*

2. The Applicants' amendment filed on 02/02/2017 was received and entered. As the results, the previous allowed claims 1-21 were cancelled. New claims 22-41 were added. Therefore, claims 22-41 are pending in this application this time.

### *Claim Rejections - 35 USC § 101*

***3.*** Claims 22-41 are rejected under 35 U.S.C. 101 because the claimed invention is directed to a judicial exception (i.e., a law of nature, a natural phenomenon, or an abstract idea) without significantly more. Claims 22 and 36 are directed to Abstract idea. The claims do not include additional elements that are sufficient to amount to significantly more than the judicial exception because each of the claims 22 and 36 directed to features of receiving first and second data…, comparing/selecting a second

computer application..., and outputting/presenting the second computer application to one or more available devices. The features recited in claims 22 and 36 are generic computer features and each step or feature does no more than require a generic computer to perform generic computer functions. The generic computer functions do not add meaningful limitation to the abstract idea. This concept is similar in concept to that of comparing stored and input data and rules, which was identified by the courts as an abstract idea (SmartGene, Inc. v. Advanced Biological Labs, SA, 555 Fed. Appx. 950 (Fed. Circ. 2014)).

The claim(s) does/do not include additional elements that are sufficient to amount to significantly more than the judicial exception because there are not any additional steps that are not abstract, thus there is no limitation that is "significantly more". The additional elements or combination of elements in this claim other than the abstract idea per se amounts to no more than

(i) mere instructions to implement the idea on a computer, and/or

(ii) recitation of generic computer structure that serves to perform generic computer functions that are well understood, routine, and conventional activities previously known to the industry, and thus are not enough to qualify as "significantly more" than the abstract idea itself…

Dependent claims 23-35 and 37-41 are rejected with the reasons as set forth above.

***Claim Rejections - 35 USC § 102***

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (a)(2) the claimed invention was described in a patent issued under section 151, or in an application for patent published or deemed published under section 122(b), in which the patent or application, as the case may be, names another inventor and was effectively filed before the effective filing date of the claimed invention.

5. Claims 22, 23, 25-29, and 33-38 are rejected under 35 U.S.C. 102(a)(2) as being anticipated by Vendrow (Pub. No.: US 2012/0021730).

***Regarding claim 22***, Vendrow teaches a method of providing context to a phone call, comprising:

receiving the phone call ***(i.e., Call Management System (CMS) 106 receiving an inbound call; para. [0037]***);

receiving first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls ***(i.e., caller ID information from the received inbound call as an intention or a purpose of routing the inbound call (para. [0037]); receiving caller ID information from the call frequency wherein the calls should be connected to the intended recipient, but they are connected to alternate callee based prior calls from the callers; para. [0025] and [0027])***;

receiving second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls ***(i.e., Caller Router 340 of the CMS 106 accesses database 350 to receive stored information as well as default routing policy or customized routing policy in order to perform routing actions of the inbound call; para. [0034]-[0036])***;

selecting a second computer application that is relevant to the phone call based on the first data and the second data ***(i.e., depending on types of available communication devices, for examples, application 902 as a softphone application is selected as "panel" or "panels" (para. [0049]); another application, such as a host, client, web service-based, etc. is selected (para. [0050]) and a video and audio editing application is selected, para. [0060])***; and

presenting the second computer application on one or more available devices ***(also note para. [0049], [0050] and [0060])***.

Regarding claim 23, Vendrow further teaches the CMS 306 can include a Database 350 or any other storage mechanism for maintaining caller ID rules, and subsequent actions to creating routing rules, etc. (para. [0032]). Vendrow also teaches the call router 340 can be configured to record call activity/history (para. [0037]).

Regarding claim 25, note para. [0037].

Regarding claims 26, 27, also note the "preferred customer", email address, etc. as limitations of the claims in para. [0023].

Regarding claim 28, note the caller ID information is replaced with "wife" for the inbound call as a family communication or the caller ID information is replaced with

"preferred customer" for the inbound call as a commercial communication from the caller in para. [0028].

Regarding claim 29, note para. [0061].

Regarding claim 33, Vendrow further teaches the feature of matching the caller-ID to a caller name, or to website, or to the user PC application, or to the client call controller application, etc., at the callee device. Then, one of the applications is selected to perform the matching (para. [0042])

Regarding claim 34, note the CMS 106 routes the call to the nearest callee device 108 in para. [0028].

Regarding claim 35, note para. [0022].

***Regarding claim 36***, Vendrow teaches a computer-readable storage device storing computer-executable instructions that when executed by a computer processor, cause the computer processor to:

receiving the phone call ***(i.e., Call Management System (CMS) 106 receiving an inbound call; para. [0037])***;

receiving first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls ***(i.e., caller ID information from the received inbound call as an intention or a purpose of routing the inbound call (para. [0037]); receiving caller ID information from the call frequency wherein the calls should be connected to the intended recipient, but they are connected to alternate callee based prior calls from the callers; para. [0025] and [0027])***;

receiving second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls ***(i.e., Caller Router 340 of the CMS 106 accesses database 350 to receive stored information as well as default routing policy or customized routing policy in order to perform routing actions of the inbound call; para. [0034]-[0036])***;

selecting a second computer application that is relevant to the phone call based on the first data and the second data ***(i.e., depending on types of available communication devices, for examples, application 902 as a softphone application is selected as "panel" or "panels" (para. [0049]); another application, such as a host, client, web service-based, etc. is selected (para. [0050]) and a video and audio editing application is selected, para. [0060])***; and

presenting the second computer application on one or more available devices ***(also note para. [0049], [0050] and [0060])***.

Regarding claim 37, also note the "preferred customer", email address, etc. as limitations of the claim in para. [0023].

Regarding claim 38, note para. [0061].

## *Claim Rejections - 35 USC § 103*

6. The following is a quotation of 35 U.S.C. 103 which forms the basis for all obviousness rejections set forth in this Office action:

> A patent for a claimed invention may not be obtained, notwithstanding that the claimed invention is not identically disclosed as set forth in section 102, if the differences between the claimed invention and the prior art are such that the claimed invention as a whole would have been obvious before the effective filing date of the claimed invention to a person having ordinary skill in the art to which the claimed invention pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims the examiner presumes that the subject matter of the various claims was commonly owned as of the effective filing date of the claimed invention(s) absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and effective filing dates of each claim that was not commonly owned as of the effective filing date of the later invention in order for the examiner to consider the applicability of 35 U.S.C. 102(b)(2)(C) for any potential 35 U.S.C. 102(a)(2) prior art against the later invention.

7. Claim 30 is rejected under 35 U.S.C. 103 as being unpatentable over Vendrow (Pub. No.: US 2012/0021730) in view of Buddenbaum et al. (US 2016/0134579).

Regarding claim 30, Vendrow teaches all subject matters as claimed above, except for the communication comprising a social media post. However, Buddenbaum et al. (“Buddenbaum”) teaches such feature in para.[0021] and [0043].

Therefore, it would have been obvious to one of ordinary skill in the art before the effective filing date of the claimed invention to incorporate the use of the feature of the communication comprising a social media post, as taught by Buddenbaum, into view of Vendrow in order to provide context of a phone call to a called party.

8. Claims 31, 32, and 39-41 are rejected under 35 U.S.C. 103 as being unpatentable over Vendrow (Pub. No.: US 2012/0021730) in view of Kannan et al. (US 2015/0254675).

Regarding claim 31, Vendrow teaches all subject matters as claimed above, except for the tracking data comprising a text-based transcript. However, Kannan et al. ("Kannan") teaches such feature in para.[0041].

Therefore, it would have been obvious to one of ordinary skill in the art before the effective filing date of the claimed invention to incorporate the use of the feature of the tracking data comprising a text-based transcript, as taught by Kannan, into view of Vendrow in order to provide context of a phone call to a called party.

Regarding claim 32, Kannan also teaches the limitation of the claim in para. [0041].

Regarding claims 39, also note the rejection of claims 31 and 32 above.

***Regarding claim 40***, receiving the phone call ***(i.e., Call Management System (CMS) 106 receiving an inbound call; para. [0037])***;

receiving first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls ***(i.e., caller ID information from the received inbound call as an intention or a purpose of routing the inbound call (para. [0037]); receiving caller ID information from the call frequency wherein the calls should be connected to the intended recipient, but they are connected to alternate callee based prior calls from the callers; para. [0025] and [0027])***;

receiving second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls ***(i.e., Caller Router 340 of the CMS 106 accesses database 350 to receive stored***

***information as well as default routing policy or customized routing policy in order to perform routing actions of the inbound call; para. [0034]-[0036])***;

selecting a second computer application that is relevant to the phone call based on the first data and the second data ***(i.e., depending on types of available communication devices, for examples, application 902 as a softphone application is selected as "panel" or "panels" (para. [0049]); another application, such as a host, client, web service-based, etc. is selected (para. [0050]) and a video and audio editing application is selected, para. [0060])***; and

presenting the second computer application on one or more available devices ***(also note para. [0049], [0050] and [0060])***.

It should be noticed that Vendrow teaches all subject matters as claimed above, except for the features of tracking data comprising a text-based transcript, wherein the text-based transcript is produced by a natural language processing (NLP) service. However, Kannan et al. ("Kannan") teaches such features in para.[0041].

Therefore, it would have been obvious to one of ordinary skill in the art before the effective filing date of the claimed invention to incorporate the use of the feature of the tracking data comprising a text-based transcript, as taught by Kannan, into view of Vendrow in order to provide context of a phone call to a called party.

Regarding claim 41, Vendrow further teaches the limitations of the claim in para. [0023].

***Allowable Subject Matter***

9. Claim 24 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Binh K. Tieu whose telephone number is (571) 272-7510, Fax number is (571) 273-7510 and E-mail address: BINH.TIEU@USPTO.GOV.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Email at BINH.TIEU@USPTO.GOV or supervisor, Mr. Curtis Kuntz, can be reached on (571) 272-7499.

Any response to this action should be mailed to:
Commissioner of Patents and Trademarks
Washington, D.C. 20231
Or faxed to: (571) 273-8300
Hand Carry Deliveries to:
Customer Service Window
(Randolph Building)
401 Dulany Street
Alexandria, VA 22314

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (FAIR) 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 FAIR system, see http://pair-direct.uspto.gov. If you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/**BINH K. TIEU**/
Primary Examiner
Technology Division 2656

Date: March 2017

| Notice of References Cited | Application/Control No. 14/988,350 | Applicant(s)/Patent Under Reexamination DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | Page 1 of 1 |

**U.S. PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Name | CPC Classification | US Classification |
|---|---|---|---|---|---|---|
| * | A | US-2012/0021730 A1 | 01-2012 | Vendrow; Vlad | H04M3/02 | 455/415 |
| * | B | US-2016/0134579 A1 | 05-2016 | Buddenbaum; Donald E. | H04L51/32 | 709/206 |
| * | C | US-2015/0254675 A1 | 09-2015 | KANNAN; Pallipuram V. | G06Q30/016 | 705/304 |
| | D | US- | | | | |
| | E | US- | | | | |
| | F | US- | | | | |
| | G | US- | | | | |
| | H | US- | | | | |
| | I | US- | | | | |
| | J | US- | | | | |
| | K | US- | | | | |
| | L | US- | | | | |
| | M | US- | | | | |

**FOREIGN PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Country | Name | CPC 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.

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| CPC- SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| H04M 2201/40, 2203/251, 2203/352, 2203/353, 3/2209, 1/64, 3/493 | 07/07/2016 | /BKT/ |
| H04L 51/04, 51/32 | 07/07/2016 | /BKT/ |
| G06Q 10/10 | 07/07/2016 | /BKT/ |

| CPC COMBINATION SETS - SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| | | |

| US CLASSIFICATION SEARCHED | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| 379/ | 88.19, 88.2, 93.17, 93.23, 142.01, 142.06, 142.09, 142.14, 142.17, 245, 247 | 07/07/2016 | /BKT/ |
| UPDATED | SEARCHES | 10/29/2016 | /BKT/ |
| 379 | 142.04, | 10/29/2016 | /BKT/ |
| UPDATED | SEARCHES | 03/01/2017 | /BKT/ |

| SEARCH NOTES | | |
|---|---|---|
| Search Notes | Date | Examiner |
| WEST DATABASES TERMS SEARCHES | 07/07/2016 | /BKT/ |
| WEST DATABASES TERMS SEARCHES | 03/01/2017 | /BKT/ |

| INTERFERENCE SEARCH | | | |
|---|---|---|---|
| US Class/ CPC Symbol | US Subclass / CPC Group | Date | Examiner |
| 379 | 142.01, 142.04, 142.14, 142.17 | 10/29/2016 | /BKT/ |

| | |
|---|---|
| | |



Patent Owner Ex. 2102
Page 150 of 304

# WEST Search History for Application 14988350

## Creation Date: 2017030212:27

## Prior Art Searches

| Query | DB | Hits | Op. | Plur. | Thes. | Date |
|---|---|---|---|---|---|---|
| intention with (call or communication or session) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 7682 | ADJ | YES | | 02-27-2017 |
| receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 77019 | ADJ | YES | | 02-27-2017 |
| (receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) ) and (intention with (call or communication or session) ) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 715 | ADJ | YES | | 02-27-2017 |
| (calling party or caller or call (originator or initiator)) or call profile | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 166684 | ADJ | YES | | 02-27-2017 |
| ((calling party or caller or call (originator or initiator)) or call profile ) and (receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) and intention with (call or communication or session) ) | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 441 | ADJ | YES | | 02-27-2017 |
| purpose with (call or communication or session) | PGPB, USPT, USOC, | 268725 | ADJ | YES | | 02-27-2017 |



Patent Owner Ex. 2102
Page 151 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | EPAB, JPAB, DWPI, TDBD | | | | | |
| **(purpose with (call or communication or session) ) or (intention with (call or communication or session) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 274451 | ADJ | YES | | 02-27-2017 |
| **(purpose with (call or communication or session) or intention with (call or communication or session) ) and (receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 16411 | ADJ | YES | | 02-27-2017 |
| **(purpose with (call or communication or session) or intention with (call or communication or session) and receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) ) and ((calling party or caller or call (originator or initiator)) or call profile )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 9155 | ADJ | YES | | 02-27-2017 |
| **(action with call) same (purchase or payment or appointment or (edit with document))** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2600 | ADJ | YES | | 02-27-2017 |
| **((action with call) same (purchase or payment or appointment or (edit with document)) ) and (purpose with (call or communication or session) or intention with (call or communication or session) and receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) and (calling party or caller or call (originator or initiator)) or call profile )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 235 | ADJ | YES | | 02-27-2017 |
| **previous with (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, | 88147 | ADJ | YES | | 02-27-2017 |



Patent Owner Ex. 2102
Page 152 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | DWPI, TDBD | | | | | |
| **(previous with (call or communication or session) ) and ((action with call) same (purchase or payment or appointment or (edit with document)) and purpose with (call or communication or session) or intention with (call or communication or session) and receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) and (calling party or caller or call (originator or initiator)) or call profile )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 168 | ADJ | YES | | 02-27-2017 |
| **(computer or word processing or email or presentation processing or search or social media or calendar or payment) application same (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 36688 | ADJ | YES | | 02-27-2017 |
| **((computer or word processing or email or presentation processing or search or social media or calendar or payment) application same (call or communication or session) ) and (previous with (call or communication or session) and (action with call) same (purchase or payment or appointment or (edit with document)) and purpose with (call or communication or session) or intention with (call or communication or session) and receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) and (calling party or caller or call (originator or initiator)) or call profile )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 43 | ADJ | YES | | 02-27-2017 |
| **Johnson.in.** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 138154 | ADJ | YES | | 02-27-2017 |
| **((computer or word processing or email or presentation processing or search or social media or calendar or payment) application same (call or communication or session) and previous with (call or communication or session) and (action with call) same (purchase or payment or appointment or (edit with** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 5 | ADJ | YES | | 02-27-2017 |



Patent Owner Ex. 2102
Page 153 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **document)) and purpose with (call or communication or session) or intention with (call or communication or session) and receiv$3 with (phone or telephone or incoming inbound)(call or communication or session) and (calling party or caller or call (originator or initiator)) or call profile ) not (Johnson.in. )** | | | | | | |
| **(previous or history)with (call or session or communication)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 132973 | ADJ | YES | | 02-28-2017 |
| **call action** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 5001 | ADJ | YES | | 02-28-2017 |
| **(call action ) and ((previous or history)with (call or session or communication) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 1259 | ADJ | YES | | 02-28-2017 |
| **379/142.$.ccls.** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 4022 | ADJ | YES | | 02-28-2017 |
| **(379/142.$.ccls. ) and (call action and (previous or history)with (call or session or communication) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 12 | ADJ | YES | | 02-28-2017 |
| **379/142.$.ccls.** | PGPB, USPT, USOC, EPAB, | 4022 | ADJ | YES | | 02-28-2017 |

| | | | | | | |
|---|---|---|---|---|---|---|
| | JPAB, DWPI, TDBD | | | | | |
| **execut$3 with computer application** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 10634 | ADJ | YES | | 02-28-2017 |
| **(379/142.$.ccls. ) and (execut$3 with computer application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 4 | ADJ | YES | | 02-28-2017 |
| **(relevant or relative) with computer application** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 727 | ADJ | YES | | 02-28-2017 |
| **((relevant or relative) with computer application ) and (379/142.$.ccls. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 02-28-2017 |
| **((relevant or relative) with computer application ) same (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 200 | ADJ | YES | | 02-28-2017 |
| **(previous or history) with (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 132973 | ADJ | YES | | 02-28-2017 |
| | | 83 | ADJ | YES | | 02-28-2017 |



Patent Owner Ex. 2102
Page 155 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **((previous or history) with (call or communication or session) ) and ((relevant or relative) with computer application same (call or communication or session) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | | | | | |
| **((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) ) and (intention or purpose)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 83 | ADJ | YES | | 02-28-2017 |
| **flinn.in.** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 643 | ADJ | YES | | 02-28-2017 |
| **((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) ) not (flinn.in. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 7 | ADJ | YES | | 02-28-2017 |
| **(select$3 or choos$3 or chosen) with computer application** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2848 | ADJ | YES | | 02-28-2017 |
| **((select$3 or choos$3 or chosen) with computer application ) and (379/142.$.ccls. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 02-28-2017 |
| **((previous or history) with (call or communication or session) ) and ((select$3 or choos$3 or chosen) with computer application )** | PGPB, USPT, USOC, EPAB, | 233 | ADJ | YES | | 02-28-2017 |



Patent Owner Ex. 2102
Page 156 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | JPAB, DWPI, TDBD | | | | | |
| **((previous or history) with (call or communication or session) and (select$3 or choos$3 or chosen) with computer application ) and ((relevant or relative) with computer application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 7 | ADJ | YES | | 02-28-2017 |
| **((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. ) or ((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 83 | ADJ | YES | | 02-28-2017 |
| **((previous or history) with (call or communication or session) and (select$3 or choos$3 or chosen) with computer application and (relevant or relative) with computer application ) not ((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 6 | ADJ | YES | | 02-28-2017 |
| **intention or (family or business) matter** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 448776 | ADJ | YES | | 02-28-2017 |
| **(intention or (family or business) matter ) and (379/142.$.ccls. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, | 197 | ADJ | YES | | 02-28-2017 |



Patent Owner Ex. 2102
Page 157 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | TDBD | | | | | |
| **application with (context or content)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 960367 | ADJ | YES | | 02-28-2017 |
| **(application with (context or content) ) and (intention or (family or business) matter and 379/142.$.ccls. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 57 | ADJ | YES | | 02-28-2017 |
| **computer application with (context or content)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 3392 | ADJ | YES | | 02-28-2017 |
| **(computer application with (context or content) ) and (intention or (family or business) matter and 379/142.$.ccls. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 02-28-2017 |
| **(computer application with (context or content) ) and (intention or (family or business) matter )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 419 | ADJ | YES | | 02-28-2017 |
| **(computer application with (context or content) and intention or (family or business) matter ) and ((previous or history) with (call or communication or session) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 94 | ADJ | YES | | 02-28-2017 |
| **(computer application with (context or content) and intention or (family or business) matter and (previous or history) with (call or** | PGPB, USPT, USOC, | 78 | ADJ | YES | | 02-28-2017 |



Patent Owner Ex. 2102
Page 158 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **communication or session) ) and ((relevant or relative) with computer application )** | EPAB, JPAB, DWPI, TDBD | | | | | |
| **((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) ) or ((previous or history) with (call or communication or session) and (select$3 or choos$3 or chosen) with computer application and (relevant or relative) with computer application not (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 89 | ADJ | YES | | 02-28-2017 |
| **(computer application with (context or content) and intention or (family or business) matter and (previous or history) with (call or communication or session) and (relevant or relative) with computer application ) not ((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) or (previous or history) with (call or communication or session) and (select$3 or choos$3 or chosen) with computer application and (relevant or relative) with computer application not (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2 | ADJ | YES | | 02-28-2017 |



Patent Owner Ex. 2102
Page 159 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) )** | | | | | | |
| **(application with (context or content) and intention or (family or business) matter and 379/142.$.ccls. ) not ((previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) or (previous or history) with (call or communication or session) and (select$3 or choos$3 or chosen) with computer application and (relevant or relative) with computer application not (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) not flinn.in. or (previous or history) with (call or communication or session) and (relevant or relative) with computer application same (call or communication or session) and (intention or purpose) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 57 | ADJ | YES | | 02-28-2017 |
| **20120021730** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 3 | ADJ | YES | | 03-01-2017 |
| **(20120021730 ) and email** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2 | ADJ | YES | | 03-01-2017 |
| **(20120021730 ) and edit$4** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, | 2 | ADJ | YES | | 03-01-2017 |



Patent Owner Ex. 2102
Page 160 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | TDBD | | | | | |
| **social media post** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 1806 | ADJ | YES | | 03-01-2017 |
| **(mak$3 or made or originat$3 or initiat$3) with (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 910932 | ADJ | YES | | 03-01-2017 |
| **((mak$3 or made or originat$3 or initiat$3) with (call or communication or session) ) same (social media post )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 87 | ADJ | YES | | 03-01-2017 |
| **text-based transcript** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 35 | ADJ | YES | | 03-01-2017 |
| **(text-based transcript ) and ((mak$3 or made or originat$3 or initiat$3) with (call or communication or session) same social media post )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 03-01-2017 |
| **(text-based transcript ) same (call or communication or session)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 19 | ADJ | YES | | 03-01-2017 |
| **natural language processing or nlp** | PGPB, USPT, USOC, | 21295 | ADJ | YES | | 03-01-2017 |



Patent Owner Ex. 2102
Page 161 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | EPAB, JPAB, DWPI, TDBD | | | | | |
| **(natural language processing or nlp ) and (text-based transcript )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 6 | ADJ | YES | | 03-01-2017 |
| **(natural language processing or nlp ) same text-based** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 185 | ADJ | YES | | 03-01-2017 |
| **(natural language processing or nlp ) same text-based transcript** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 03-01-2017 |
| **(natural language processing or nlp ) same text transcript** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 39 | ADJ | YES | | 03-01-2017 |
| **(natural language processing or nlp ) same produc$3** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 3575 | ADJ | YES | | 03-01-2017 |
| **(natural language processing or nlp same produc$3 ) and text based** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 556 | ADJ | YES | | 03-01-2017 |



Patent Owner Ex. 2102
Page 162 of 304

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | | | | | | |
| | 1 | = | = | - | | | | | | |
| | 2 | = | = | - | | | | | | |
| | 3 | = | = | - | | | | | | |
| | 4 | = | = | - | | | | | | |
| | 5 | = | = | - | | | | | | |
| | 6 | = | = | - | | | | | | |
| | 7 | = | = | - | | | | | | |
| | 8 | = | = | - | | | | | | |
| | 9 | = | = | - | | | | | | |
| | 10 | = | = | - | | | | | | |
| | 11 | = | = | - | | | | | | |
| | 12 | = | = | - | | | | | | |
| | 13 | = | = | - | | | | | | |
| | 14 | = | = | - | | | | | | |
| | 15 | = | = | - | | | | | | |
| | 16 | ✓ | = | - | | | | | | |
| | 17 | O | - | - | | | | | | |
| | 18 | ✓ | = | - | | | | | | |
| | 19 | ✓ | = | - | | | | | | |
| | 20 | O | = | - | | | | | | |
| | 21 | | = | - | | | | | | |
| | 22 | | | ✓ | | | | | | |
| | 23 | | | ✓ | | | | | | |
| | 24 | | | O | | | | | | |
| | 25 | | | ✓ | | | | | | |
| | 26 | | | ✓ | | | | | | |
| | 27 | | | ✓ | | | | | | |
| | 28 | | | ✓ | | | | | | |
| | 29 | | | ✓ | | | | | | |
| | 30 | | | ✓ | | | | | | |
| | 31 | | | ✓ | | | | | | |
| | 32 | | | ✓ | | | | | | |
| | 33 | | | ✓ | | | | | | |
| | 34 | | | ✓ | | | | | | |
| | 35 | | | ✓ | | | | | | |
| | 36 | | | ✓ | | | | | | |

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | 03/02/2017 | | | | | | |
| | 37 | | | ✓ | | | | | | |
| | 38 | | | ✓ | | | | | | |
| | 39 | | | ✓ | | | | | | |
| | 40 | | | ✓ | | | | | | |
| | 41 | | | ✓ | | | | | | |

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 | 14988350 | Filing Date | 2016-01-05 | Docket Number (if applicable) | 358721-US-NP | Art Unit | 2656 |
| First Named Inventor | Gautam Deora | | | Examiner Name | Tieu, Binh Kien | | |

**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 _____

### 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 _____

### 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 | /Barry D. Blount/ | Date (YYYY-MM-DD) | 2017-02-02 |
| Name | Barry D. Blount | Registration Number | 35069 |

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.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

| | | | |
|---|---|---|---|
| In re Application of: Gautam Deora, et al. | § | Confirmation No. | 7481 |
| Serial No.: 14/988,350 | § | Group Art Unit: | 2656 |
| Filed: January 5, 2016 | § | Examiner: | Tieu, Binh Kien |
| For: Cross Device Companion Application For Phone | § | Atty. Docket: | 358721-US-NP |

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

CERTIFICATE OF TRANSMISSION OR MAILING
37 C.F.R. 1.8

I hereby certify that this correspondence is being transmitted by facsimile to the United States Patent and Trademark Office in accordance with 37 C.F.R. § 1.6(d), or is being transmitted via the Office electronic filing system in accordance with 37 C.F.R. § 1.6(a)(4), or is being deposited with the U.S. 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 below:

| February 2, 2017 | /Barry D. Blount/ |
|---|---|
| Date | Barry D. Blount, Reg. No. 35,069 |

Sir:

**PRELIMINARY AMENDMENT ACCOMPANYING**
**REQUEST FOR CONTINUED EXAMINATION UNDER 37 C.F.R. § 1.114**

In response to a Notice of Allowance dated November 3, 2016, the Applicants have elected to file a Request for Continued Examination (RCE) to continue prosecution of the above-identified case. This Preliminary Amendment is the Applicants' submission pursuant to 37 C.F.R. § 1.114. Prior to examination of the application, please enter the amendments set forth herein and consider the accompanying remarks.

If the amount electronically authorized is insufficient, or if the amount is unable to be charged to the credit card for any other reason, the Commissioner is authorized to charge Deposit Account No. 50-4474; Order No. 358721-US-NP. Authorized by Deposit Account user /Barry D. Blount, Reg. No. 35,069/ Barry D. Blount.

## AMENDMENTS TO THE CLAIMS

Please cancel claims 1-16 and 18-21, and add new claims 22-41, as shown below. Pursuant to 37 C.F.R. § 1.121(c), the text of all pending claims, along with their current status, is set forth below.

1-21. (Canceled).

22. (New) A method of providing context to a phone call, comprising:

receiving the phone call;

receiving first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls;

receiving second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;

selecting a second computer application that is relevant to the phone call based on the first data and the second data; and

presenting the second computer application on one or more available devices.

23. (New) The method of claim 22, comprising producing and storing the tracking data associated with the previous phone calls, wherein the tracking data associated with the previous phone calls describes at least one previous intention and at least one previous action.

24. (New) The method of claim 23, wherein the tracking data associated with the previous phone calls describes at least one previous application, at least one previous

application used during the previous phone calls, at least one content referenced during the previous phone calls, at least one search performed during the previous phone calls, and at least one note taken during the previous phone calls.

25. (New) The method of claim 22, comprising receiving an identifier of a caller that initiates the phone call.

26. (New) The method of claim 25, wherein the identifier of the caller comprises an email address of the caller.

27. (New) The method of claim 25, wherein the identifier comprises a social media identifier of the caller.

28. (New) The method of claim 22, wherein the intention comprises one of a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, and a commercial communication.

29. (New) The method of claim 22, where the action comprises one of a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, and an edit to a presentation.

30. (New) The method of claim 29, where the communication to make comprises a social media post.

31. (New) The method of claim 22, wherein the tracking data comprises a text-based transcript of the phone call.

32. (New) The method of claim 31, wherein the text-based transcript is produced by a natural language processing (NLP) service.

33. (New) The method of claim 22, comprising selecting one or more devices associated with a recipient of the phone call to run the second computer application.

34. (New) The method of claim 33, wherein the one or more devices are selected based on one or more of a workload of the devices, a proximity of the devices to the recipient of the phone call, and the second computer application.

35. (New) The method of claim 22, where the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

36. (New) A computer-readable storage device storing computer-executable instructions that when executed by a computer processor, cause the computer processor to:

receive a phone call;

receive first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls, at least one previous intention, and at least one previous action;

receive second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;

select a second computer application that is relevant to the phone call based on the first data and the second data; and

present the second computer application on one or more available devices.

37. (New) The computer-readable storage device of claim 36, wherein the computer-executable instructions cause the computer processor to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises a social media identifier of the caller.

38. (New) The computer-readable storage device of claim 36, wherein the action comprises a communication to make, where the communication to make comprises a text message.

39. (New) The computer-readable storage device of claim 36, wherein the tracking data comprises a text-based transcript of the phone call, and wherein the text-based transcript is produced by a natural language processing (NLP) service.

40. (New) An apparatus, comprising:

a processing unit;

a memory comprising computer-executable code that, when executed by the processing unit, cause the processing unit to:

receive a phone call;

receive first data that describes an intention associated with the phone call, the intention being learned from tracking data associated with one or more previous phone calls, and the tracking data comprising a first application used during one or more of the previous phone calls, at least one previous intention, at least one previous action, and a text-based transcript of the phone call, wherein the text-based transcript is produced by a natural language processing (NLP) service;

receive second data that describes an action associated with the phone call, the action being learned from the tracking data associated with the previous phone calls;

select a second computer application that is relevant to the phone call based on the first data and the second data; and

present the second computer application on one or more available devices.

41. (New) The apparatus of claim 40, wherein the computer-executable code cause the processing unit to receive an identifier of a caller that initiates the phone call, wherein the identifier of the caller comprises an email address of the caller.

## REMARKS

The Applicants are filing this Preliminary Amendment and Request for Continued Examination in response to a Notice of Allowance dated November 3, 2016. At the time of the Office Action, claims 1-16 and 18-21 were allowed. In response to the Notice of Allowance, the Applicants have canceled claims 1-16 and 18-21, and added new claims 22-41. No new matter has been added by way of these amendments. Upon entry of the amendments, claims 22-41 remain pending.

## Conclusion

The Applicants respectfully assert that all pending claims are in condition for allowance. However, if the Examiner wishes to discuss any issue regarding the present application by way of a telephone conference, the Examiner is kindly invited to contact the undersigned attorney at the telephone number indicated below.

Respectfully submitted,

Date: February 2, 2017

/Barry D. Blount/
Barry D. Blount
Reg. No. 35,069
International IP Law Group, PLLC
(832) 375-0200

**CORRESPONDENCE ADDRESS:**
Microsoft Corporation
Patent Group Docketing Dept.
One Microsoft Way
Redmond, WA 98052

# Electronic Patent Application Fee Transmittal

| | |
|---|---|
| **Application Number:** | 14988350 |
| **Filing Date:** | 05-Jan-2016 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Attorney Docket Number:** | 358721-US-NP |

Filed as Large Entity

**Filing Fees for Utility under 35 USC 111(a)**

| 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($) |
|---|---|---|---|---|
| **Miscellaneous:** | | | | |
| RCE- 1st Request | 1801 | 1 | 1200 | 1200 |
| | | **Total in USD ($)** | | **1200** |

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 28240137 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 02-FEB-2017 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 17:10:15 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | yes |
| Payment Type | CARD |
| Payment was successfully received in RAM | $1200 |
| RAM confirmation Number | 020317INTEFSW17111600 |
| Deposit Account | |
| Authorized User | |

The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows:

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | Request for Continued Examination (RCE) | 358721_US_NP_RCE.pdf | 79151<br>c2cd8e51fb26bbfb7b036c0e230044c9f42223dd | no | 3 |
| **Warnings:** | | | | | |
| This is not a USPTO supplied RCE SB30 form. | | | | | |
| **Information:** | | | | | |
| 2 | | 358721_US_NP_PreliminaryAmend.pdf | 36090<br>ea27bbcddfefcae2cbe9ad4cbf6bf4c2151d2c23 | yes | 7 |

| Multipart Description/PDF files in .zip description | | |
|---|---|---|
| **Document Description** | **Start** | **End** |
| Amendment Submitted/Entered with Filing of CPA/RCE | 1 | 1 |
| Claims | 2 | 6 |
| Applicant Arguments/Remarks Made in an Amendment | 7 | 7 |

| | | | | | |
|---|---|---|---|---|---|
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 3 | Fee Worksheet (SB06) | fee-info.pdf | 30662<br>9bb6fda09041549571af75b4ba492b6e3cced1ae | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | **Total Files Size (in bytes):** | 145903 | | |

**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/06 (09-11)
Approved for use through 1/31/2014. OMB 0651-0032
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.

| PATENT APPLICATION FEE DETERMINATION RECORD<br>Substitute for Form PTO-875 | Application or Docket Number<br>14/988,350 | Filing Date<br>01/05/2016 | ☐ 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 **02/02/2017**

| | (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)) | * 20 | Minus | ** 20 | = 0 | X $80 = | 0 |
| Independent (37 CFR 1.16(h)) | * 3 | Minus | ***3 | = 0 | X $420 = | 0 |
| ☐ Application Size Fee (37 CFR 1.16(s)) | | | | | | |
| ☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j)) | | | | | | |
| | | | | | TOTAL ADD'L FEE | 0 |

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.

LIE
KIMBERLY PANNELL

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.*

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

69316 7590 11/03/2016

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

DATE MAILED: 11/03/2016

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

TITLE OF INVENTION: Cross Device Companion Application For Phone

| APPLN. TYPE | ENTITY STATUS | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(S) DUE | DATE DUE |
|---|---|---|---|---|---|---|
| nonprovisional | UNDISCOUNTED | $960 | $0 | $0 | $960 | 02/03/2017 |

**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)

69316 7590 11/03/2016
MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

TITLE OF INVENTION: Cross Device Companion Application For Phone

| APPLN. TYPE | ENTITY STATUS | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(S) DUE | DATE DUE |
|---|---|---|---|---|---|---|
| nonprovisional | UNDISCOUNTED | $960 | $0 | $0 | $960 | 02/03/2017 |

| EXAMINER | ART UNIT | CLASS-SUBCLASS |
|---|---|---|
| TIEU, BINH KIEN | 2656 | 379-142010 |

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. _____



Patent Owner Ex. 2102
Page 182 of 304

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721-US-NP | 7481 |

69316 7590 11/03/2016

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER | |
|---|---|
| TIEU, BINH KIEN | |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

DATE MAILED: 11/03/2016

**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. 14/988,350 | Applicant(s) DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | AIA (First Inventor to File) Status Yes |

***-- 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 *10/12/2016*.
   ☐ 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 *1-16 and 18-21*. 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 _____.

/BINH TIEU/
Primary Examiner, Art Unit 2656

## DETAILED ACTION

### *Response to Amendment*

1. The Applicants' amendment filed on 10/12/2016 was received and entered. As the results, claim 17 was cancelled. New claim 21 was added. Therefore, claims 1-16 and 18-21 are pending wherein claims 1, 15 and 16 are independent claims in this application at this time.

### *Allowable Subject Matter*

2. Claims 1-16 and 18-21 are allowed.

3. The following is an examiner's statement of reasons for allowance:

The prior art of record failed to clearly teach or fairly suggest the combination of features as recited and connected in each of the independent claims 1, 15 and 16.

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."

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Binh K. Tieu whose telephone number is (571) 272-7510, Fax number is (571) 273-7510 and E-mail address: BINH.TIEU@USPTO.GOV.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Email at BINH.TIEU@USPTO.GOV or supervisor, Mr. Curtis Kuntz, can be reached on (571) 272-7499.

Any response to this action should be mailed to:
Commissioner of Patents and Trademarks
Washington, D.C. 20231
Or faxed to: (571) 273-8300
Hand Carry Deliveries to:
Customer Service Window
(Randolph Building)
401 Dulany Street
Alexandria, VA 22314

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (FAIR) 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 FAIR system, see http://pair-direct.uspto.gov. If you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/**BINH K. TIEU**/
Primary Examiner
Technology Division 2656

Date: October 2016

| Notice of References Cited | Application/Control No. 14/988,350 | Applicant(s)/Patent Under Reexamination DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | Page 1 of 1 |

**U.S. PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Name | CPC Classification | US Classification |
|---|---|---|---|---|---|---|
| * | A | US-2014/0337249 A1 | 11-2014 | Bank; Judith H. | G06Q30/0282 | 705/347 |
| | B | US- | | | | |
| | C | US- | | | | |
| | D | US- | | | | |
| | E | US- | | | | |
| | F | US- | | | | |
| | G | US- | | | | |
| | H | US- | | | | |
| | I | US- | | | | |
| | J | US- | | | | |
| | K | US- | | | | |
| | L | US- | | | | |
| | M | US- | | | | |

**FOREIGN PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Country | Name | CPC 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.

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| CPC- SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| H04M 2201/40, 2203/251, 2203/352, 2203/353, 3/2209, 1/64, 3/493 | 07/07/2016 | /BKT/ |
| H04L 51/04, 51/32 | 07/07/2016 | /BKT/ |
| G06Q 10/10 | 07/07/2016 | /BKT/ |

| CPC COMBINATION SETS - SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| | | |

| US CLASSIFICATION SEARCHED | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| 379/ | 88.19, 88.2, 93.17, 93.23, 142.01, 142.06, 142.09, 142.14, 142.17, 245, 247 | 07/07/2016 | /BKT/ |
| UPDATED | SEARCHES | 10/29/2016 | /BKT/ |
| 379 | 142.04, | 10/29/2016 | /BKT/ |

| SEARCH NOTES | | |
|---|---|---|
| Search Notes | Date | Examiner |
| WEST DATABASES TERMS SEARCHES | 07/07/2016 | /BKT/ |

| INTERFERENCE SEARCH | | | |
|---|---|---|---|
| US Class/ CPC Symbol | US Subclass / CPC Group | Date | Examiner |
| 379 | 142.01, 142.04, 142.14, 142.17 | 10/29/2016 | /BKT/ |

| | |
|---|---|
| | |

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | 10/29/2016 | | | | | | | |
| 1 | 1 | = | = | | | | | | | |
| 2 | 2 | = | = | | | | | | | |
| 4 | 3 | = | = | | | | | | | |
| 5 | 4 | = | = | | | | | | | |
| 6 | 5 | = | = | | | | | | | |
| 7 | 6 | = | = | | | | | | | |
| 8 | 7 | = | = | | | | | | | |
| 9 | 8 | = | = | | | | | | | |
| 10 | 9 | = | = | | | | | | | |
| 11 | 10 | = | = | | | | | | | |
| 12 | 11 | = | = | | | | | | | |
| 13 | 12 | = | = | | | | | | | |
| 14 | 13 | = | = | | | | | | | |
| 3 | 14 | = | = | | | | | | | |
| 15 | 15 | = | = | | | | | | | |
| 16 | 16 | ✓ | = | | | | | | | |
| | 17 | O | - | | | | | | | |
| 17 | 18 | ✓ | = | | | | | | | |
| 18 | 19 | ✓ | = | | | | | | | |
| 19 | 20 | O | = | | | | | | | |
| 20 | 21 | | = | | | | | | | |

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

| CPC | | | | | | |
|---|---|---|---|---|---|---|
| **Symbol** | | | | | **Type** | **Version** |
| H04M | | 7 | / | 0027 | F | 2013-01-01 |
| H04M | | 3 | / | 42042 | I | 2013-01-01 |
| G10L | | 15 | / | 065 | I | 2013-01-01 |
| G06N | | 99 | / | 005 | A | 2013-01-01 |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |
| | | | / | | | |

| CPC Combination Sets | | | | | | | |
|---|---|---|---|---|---|---|---|
| **Symbol** | | | | | **Type** | **Set** | **Ranking** | **Version** |
| | | | / | | | | | |
| | | | / | | | | | |

| NONE | | **Total Claims Allowed:** | |
|---|---|---|---|
| (Assistant Examiner) | (Date) | 20 | |
| /BINH TIEU/<br>Primary Examiner.Art Unit 2656 | 10/29/2016 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

| US ORIGINAL CLASSIFICATION | | INTERNATIONAL CLASSIFICATION | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| CLASS | SUBCLASS | CLAIMED | | | | | NON-CLAIMED | | | | | |
| 379 | 142.01 | H | 0 | 4 | M | 1 / 56 (2006.01.01) | | | | | | |
| CROSS REFERENCE(S) | | H | 0 | 4 | M | 15 / 06 (2006.01.01) | | | | | | |

| CLASS | SUBCLASS (ONE SUBCLASS PER BLOCK) | | | | |
|---|---|---|---|---|---|
| 379 | 142.04 | 142.14 | 142.17 | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |

| NONE | | Total Claims Allowed: | |
|---|---|---|---|
| (Assistant Examiner) | (Date) | 20 | |
| /BINH TIEU/<br>Primary Examiner.Art Unit 2656 | 10/29/2016 | O.G. Print Claim(s) | O.G. Print Figure |
| (Primary Examiner) | (Date) | 1 | 1 |

| Issue Classification | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

☐ 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 | Final | Original |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 1 | | 17 | | | | | | | | | | | | |
| 2 | 2 | 17 | 18 | | | | | | | | | | | | |
| 4 | 3 | 18 | 19 | | | | | | | | | | | | |
| 5 | 4 | 19 | 20 | | | | | | | | | | | | |
| 6 | 5 | 20 | 21 | | | | | | | | | | | | |
| 7 | 6 | | | | | | | | | | | | | | |
| 8 | 7 | | | | | | | | | | | | | | |
| 9 | 8 | | | | | | | | | | | | | | |
| 10 | 9 | | | | | | | | | | | | | | |
| 11 | 10 | | | | | | | | | | | | | | |
| 12 | 11 | | | | | | | | | | | | | | |
| 13 | 12 | | | | | | | | | | | | | | |
| 14 | 13 | | | | | | | | | | | | | | |
| 3 | 14 | | | | | | | | | | | | | | |
| 15 | 15 | | | | | | | | | | | | | | |
| 16 | 16 | | | | | | | | | | | | | | |

| | | | |
|---|---|---|---|
| NONE<br><br>(Assistant Examiner) | (Date) | **Total Claims Allowed:**<br>20 | |
| /BINH TIEU/<br>Primary Examiner.Art Unit 2656<br><br>(Primary Examiner) | 10/29/2016<br><br>(Date) | O.G. Print Claim(s)<br>1 | O.G. Print Figure<br>1 |

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

| | | | |
|---|---|---|---|
| In re Application of: Gautam Deora et al. | § | Confirmation No. | 7481 |
| Serial No.: 14/988,350 | § | Group Art Unit: | 2656 |
| Filed: January 5, 2016 | § | Examiner: | Tieu, Binh Kien |
| For: Cross Device Companion Application For Phone | § | Atty. Docket: | 358721-US-NP |

| CERTIFICATE OF TRANSMISSION OR MAILING<br>37 C.F.R. 1.8 | |
|---|---|
| I hereby certify that this correspondence is being transmitted by facsimile to the United States Patent and Trademark Office in accordance with 37 C.F.R. § 1.6(d), or is being transmitted via the Office electronic filing system in accordance with 37 C.F.R. § 1.6(a)(4), or is being deposited with the U.S. 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 below: | |
| October 12, 2016 | /Barry D. Blount/ |
| Date | Barry D. Blount, Reg. No. 35,069 |

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

Sir:

**AMENDMENT AND RESPONSE TO**
**OFFICE ACTION DATED JULY 12, 2016**

In response to an Office Action dated July 12, 2016, the Applicants are providing the following Amendment and Response.

The Applicants assert that no fee is due in connection with the filing of this document because no fee is specified in the fee schedule set forth in the Code of Federal Regulations. However, should any fee under 37 C.F.R. §§ 1.16 to 1.21 be deemed necessary for any reason relating to this document, the Commissioner is hereby authorized to deduct said fee from Deposit Account No. 50-4474; Order No. 358721.01.

## AMENDMENTS TO THE CLAIMS

Please amend claims 16 and 18, cancel claim 17, and add new claim 21, as shown below. Pursuant to 37 C.F.R. § 1.121(c), the text of all pending claims, along with their current status, is set forth below.

1. (Original) A computerized method, comprising:

receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call;

receiving first data that describes an intention associated with the phone call;

receiving second data that describes an action associated with the phone call;

presenting third data that describes the caller, where the third data is based, at least in part, on the identifier;

selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data;

presenting the computer application on one or more devices available to a recipient of the phone call;

selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data;

presenting the electronic content to the recipient using one or more members of the one or more devices;

selectively producing fourth data that describes an action to be performed after the phone call is terminated;

selectively presenting the fourth data; and

selectively storing the fourth data.

2. (Original) The computerized method of claim 1, comprising:

producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call by the caller or a recipient of the phone call, a content referenced during the phone call by the caller or the recipient of the phone call, a search performed during the phone call by the caller or the recipient of the phone call, or a note taken during the phone call by the caller or the recipient of the phone call.

3. (Original) The computerized method of claim 1, where the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, or a social media identifier of the caller.

4. (Original) The computerized method of claim 1, where the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication.

5. (Original) The computerized method of claim 1, where the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation.

6. (Original) The computerized method of claim 5, where the communication to make is a phone call, an email, a text, or a social media post.

7. (Original) The computerized method of claim 1, where the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a

social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller.

8. (Original) The computerized method of claim 1, where the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application.

9. (Original) The computerized method of claim 1, where the piece of content relevant to the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt.

10. (Original) The computerized method of claim 1, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit.

11. (Original) The computerized method of claim 1, comprising receiving a text-based transcript of the phone call, where the text-based transcript is produced by a natural language processing (NLP) service operating in the cloud, and where the first data is selected from the text-based transcript and where the second data is selected from the text-based transcript.

12. (Original) The computerized method of claim 1, where the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

13. (Original) The computerized method of claim 12, where a member of the one or more devices is selected to present the electronic content or to run the computer application based,

at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application.

14. (Original) The computerized method of claim 2, comprising presenting the tracking data to a machine learning process that adapts how a natural language processing (NLP) service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call.

15. (Original) A computer-readable storage device storing computer-executable instructions that when executed by a computer control the computer to perform a method, the method comprising:

receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call, where the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, and a social media identifier of the caller;

receiving a text-based transcript of the phone call, where the text-based transcript is produced by a natural language processing (NLP) service operating in the cloud;

receiving first data that describes an intention associated with the phone call, where the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication, where the first data is selected from the text-based transcript;

receiving second data that describes an action associated with the phone call, where the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation, where the second data is selected from the text-based transcript;

presenting third data that describes the caller, where the third data is based, at least in part, on the identifier, where the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller;

selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data, where the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application;

presenting the computer application on one or more devices available to a recipient of the phone call, where the one or more devices include a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient, where a member of the one or more devices is selected to present the electronic content or to run the computer application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application;

selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data, where the piece of content relevant to the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt;

presenting the electronic content to the recipient using one or more members of the one or more devices;

selectively producing fourth data that describes an action to be performed after the phone call is terminated, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to

edit, or a presentation to edit, where the communication to make is a phone call, an email, a text, or a social media post;

selectively presenting the fourth data;

selectively storing the fourth data;

producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call, a content referenced during the phone call, a search performed during the phone call, or a note taken during the phone call, and

presenting the tracking data to a machine learning process that adapts how the NLP service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call.

16. (Currently Amended) An apparatus, comprising:

a processor;

a memory;

a set of logics configured to control one or more computing devices to display to a party of a phone call a relevant content and a relevant application for the phone call during the phone call; and

an interface to connect the processor, the memory, and the set of logics;

the set of logics comprising:

a first logic that identifies the party on the phone call based, at least in part, on data received from a phone used by the party, the first logic being configured to access data that was accessed by the party within a pre-determined time before the phone call or during the phone call, where the data accessed by the party comprises email data, text data, word processing data, presentation data, telephonic data, and social media data;

a second logic that identifies the relevant content and the relevant application based, at least in part, on text provided in a text-based transcript of the phone call, where the text-based transcript is provided in real time by a natural language processing (NLP) service during the phone call, and

a third logic that controls the one or more devices to selectively present the relevant content and the relevant application.

17. (Canceled).

18. (Currently Amended) The apparatus of claim 16 [[17]], the second logic being configured to select the relevant content and the relevant application based, at least in part, on whether the phone call concerns a family matter, a business matter, or a social matter and on whether the phone call concerns a physical meeting, a communication to be made, a transaction to be performed, or an update to be made to the relevant content.

19. (Original) The apparatus of claim 18, the third logic being configured to identify the one or more devices available to present the relevant content and the relevant application, and to selectively distribute the relevant content to the one or more devices, where a member of the one or more devices is selected to present the relevant content and to present the relevant application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of relevant content, or on the type of the relevant application.

20. (Original) The apparatus of claim 19, comprising a fourth logic that updates an electronic notification system with data that controls the electronic notification system to present an action item to the party on a member of the one or more devices, where the action

item concerns the physical meeting, the communication to be made, the transaction to be performed, or the update to be made to the relevant content.

21. (New) The apparatus of claim 16, comprising a fourth logic that produces and stores tracking data that describes an intention associated with the phone call, an action associated with the phone call, the relevant application, the relevant content, a search performed during the phone call by the party, or a note taken during the phone call by the party.

## REMARKS

The Applicants are filing this Amendment and Response to an Office Action dated July 12, 2016. At the time of the Office Action, claims 1-20 were pending. In response to the Office Action, the Applicants have amended claims 16 and 18, canceled claim 17, and added new claim 21. No new matter has been added by way of these amendments. Upon entry of the amendments, claims 1-16 and 18-21 remain pending. Based on the foregoing amendments and the following remarks, the Applicants respectfully assert that all pending claims are in condition for allowance.

In the Office Action, the Examiner allowed claims 1-15. The Examiner would also allow claims 17 and 20 if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

In the Office Action, the Examiner rejected claim 16 under 35 U.S.C. § 102(a)(2) as being anticipated by U.S. Patent Application Publication No. 2008/0107100 by Begeja et al. (hereinafter "Begeja"). These rejections are discussed in detail below.

### Allowable Subject Matter

The Applicants gratefully acknowledge the Examiner's recognition of allowable subject matter. More specifically, the Applicants thank the Examiner for indicating that Claims 1-15 are allowed. *See* Office Action, p. 5. "Claims 17 and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims." *Id.*

The Applicants do not concede the correctness of the Examiner's position. However, to expedite prosecution, the Applicants have amended the claims as set forth above.

Specifically, claim 16 is amended to incorporate the features of canceled claim 17. Claim 17 is thus rewritten in independent form as recommended by the Examiner, and is thus allowable. Further, claim 20 and new claim 21 ultimately depend from claim 16. Thus, claims 20 and 21 are allowable for depending from an otherwise allowable claim. In view of this amendment, the Applicants respectfully request that the Examiner withdraw the objection to the claims, and allow claims 1-16 and 18-21 to issue.

**Claim Rejection under 35 U.S.C. § 102**

With regard to the rejection of claim 16 under 35 U.S.C. § 102, claim 16 is amended as discussed above, and is thus allowable. Accordingly, the rejection of claim 16 under 35 U.S.C. § 102 is moot. The Applicants thus respectfully request that the Examiner withdraw the rejection under 35 U.S.C. § 102, and allow claim 16 to issue.

**Conclusion**

The Applicants respectfully assert that all pending claims are in condition for allowance. However, if the Examiner wishes to discuss any issue regarding the present application by way of a telephone conference, the Examiner is kindly invited to contact the undersigned attorney at the telephone number indicated below.

Respectfully submitted,

Date: October 12, 2016

/Barry D. Blount/
Barry D. Blount
Reg. No. 35,069
(832) 375-0200

**CORRESPONDENCE ADDRESS:**
Microsoft Corporation
Patent Group Docketing Dept.
One Microsoft Way
Redmond, WA 98052

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 27191230 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | Barry D. Blount/Victoria Kubitskey |
| **Filer Authorized By:** | Barry D. Blount |
| **Attorney Docket Number:** | 358721-US-NP |
| **Receipt Date:** | 12-OCT-2016 |
| **Filing Date:** | 05-JAN-2016 |
| **Time Stamp:** | 14:49:00 |
| **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 | | 358721_US_NP_ResponseNFOA.pdf | 51797<br>e04422e4b7812a930026566f469016a16468925a | yes | 12 |

| | 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 | 12 |
| **Warnings:** | | | |
| **Information:** | | | |
| | **Total Files Size (in bytes):** | 51797 | |

**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/06 (09-11)
Approved for use through 1/31/2014. OMB 0651-0032
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.

| PATENT APPLICATION FEE DETERMINATION RECORD<br>Substitute for Form PTO-875 | Application or Docket Number<br>14/988,350 | Filing Date<br>01/05/2016 | ☐ 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 **10/12/2016**

| | (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)) | * 20 | Minus | ** 20 | = 0 | X $80 = | 0 |
| Independent (37 CFR 1.16(h)) | * 3 | Minus | ***3 | = 0 | X $420 = | 0 |
| ☐ Application Size Fee (37 CFR 1.16(s)) | | | | | | |
| ☐ FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j)) | | | | | | |
| | | | | | TOTAL ADD'L FEE | 0 |

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.

LIE
MARGARET BYARS

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.*

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. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | Gautam Deora | 358721.01 | 7481 |

69316 7590 07/12/2016

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

| EXAMINER |
|---|
| TIEU, BINH KIEN |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2656 | |

| NOTIFICATION DATE | DELIVERY MODE |
|---|---|
| 07/12/2016 | 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):

stevensp@microsoft.com
chriochs@microsoft.com
usdocket@microsoft.com

| Office Action Summary | Application No. 14/988,350 | Applicant(s) DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | AIA (First Inventor to File) Status Yes |

*-- 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* MONTHS 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 *01/05/2016*.

☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were 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) *1-20* is/are pending in the application.

5a) Of the above claim(s) _____ is/are withdrawn from consideration.

6)☒ Claim(s) *1-15* is/are allowed.

7)☒ Claim(s) *16,18 and 19* is/are rejected.

8)☒ Claim(s) *17 and 20* 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 *01/05/2016* 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).

**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)).

** 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/08a and/or PTO/SB/08b) Paper No(s)/Mail Date *01/05/2016*.

3) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .

4) ☐ Other: _____.



Patent Owner Ex. 2102
Page 210 of 304

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a)(2) the claimed invention was described in a patent issued under section 151, or in an application for patent published or deemed published under section 122(b), in which the patent or application, as the case may be, names another inventor and was effectively filed before the effective filing date of the claimed invention.

2. Claim 16 is rejected under 35 U.S.C. 102(a)(2) as being anticipated by Begeja et al. (Pub. No.: US 2008/0107100).

***Regarding claim 1***, Begeja et al. ("Begeja") teaches an apparatus ***(i.e., a general-purpose computer, as shown in figure 4, para. [0051])***, comprising:

a processor,

a memory;

a set of logics configured to control one or more computing devices to display to a party of a phone call a relevant content and a relevant application for the phone call during the phone call; and

an interface to connect the processor, the memory, and the set of logics:

the set of logics comprising:

a first logic that identifies the party on the phone call based, at least in part, on data received from a phone used by the party ***(i.e., customers subscribed to services by registering the type of relevant contain that the customer wants the network to present to the customer, para. [0031], upon subscribed to the services, the subscriber (or caller or calling party) may initiate a call request, the subscriber is then identified as the subscriber of the registered services, para. [0035]-[0036])***;

a second logic that identifies the relevant content and the relevant application based: at least in part, on text provided in a text-based transcript of the phone call, where the text-based transcript is provided in real time by a natural language processing (NLP) service during the phone call ***(i.e., using the voice/speech recognizer to receive verbal triggers and convert voices in conversation into text-based of the phone call in order to identify the relevant content and delivering the identified relevant content in a format that is compatible with the compatible with the capabilities of the customer' end device; para. [0030], [0033], [0038]-[0041])***, and

a third logic that controls the one or more devices to selectively present the relevant content and the relevant application (para. [0042]).

Regarding claims 18 and 19, Begeja further teaches the conversation may be concerned about a vacation of a family, about a business call of booking a vacation between a customer and a travel agent, etc. and the relevant content is selected from the database and presented to the parties of the conversation (para. [0025]-[0028]).

***Allowable Subject Matter***

3. Claims 1-15 are allowed.

4. Claims 17 and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Hertz et al. (Pub. No.: US 2013/0007150) teaches an apparatus and a method of integrating a plurality of contact information associated from different communication and media types into a single list presented to a user via a client interface as an universal communication system for performing communications calls.

Madhavapeddi et al. teaches a system and a method for performing actions for users based on spoken information.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Binh K. Tieu whose telephone number is (571) 272-7510, Fax number is (571) 273-7510 and E-mail address: BINH.TIEU@USPTO.GOV.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's Email at BINH.TIEU@USPTO.GOV or supervisor, Mr. Curtis Kuntz, can be reached on (571) 272-7499.

Any response to this action should be mailed to:
Commissioner of Patents and Trademarks
Washington, D.C. 20231
Or faxed to: (571) 273-8300
Hand Carry Deliveries to:
Customer Service Window
(Randolph Building)
401 Dulany Street
Alexandria, VA 22314

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (FAIR) 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 FAIR system, see http://pair-direct.uspto.gov. If you have any questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/**BINH K. TIEU**/
Primary Examiner
Technology Division 2656

Date: July 2016

| Notice of References Cited | Application/Control No. 14/988,350 | Applicant(s)/Patent Under Reexamination DEORA ET AL. | |
|---|---|---|---|
| | Examiner BINH TIEU | Art Unit 2656 | Page 1 of 1 |

**U.S. PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Name | CPC Classification | US Classification |
|---|---|---|---|---|---|---|
| * | A | US-2008/0107100 A1 | 05-2008 | Begeja; Lee | H04M3/4872 | 370/352 |
| * | B | US-8,792,627 B2 | 07-2014 | Begeja; Lee | H04M3/4872 | 379/114.13 |
| * | C | US-2013/0007150 A1 | 01-2013 | Hertz; Bryan | H04L51/32 | 709/206 |
| * | D | US-2014/0241514 A1 | 08-2014 | Madhavapeddi; Shreedhar | H04M3/493 | 379/88.04 |
| | E | US- | | | | |
| | F | US- | | | | |
| | G | US- | | | | |
| | H | US- | | | | |
| | I | US- | | | | |
| | J | US- | | | | |
| | K | US- | | | | |
| | L | US- | | | | |
| | M | US- | | | | |

**FOREIGN PATENT DOCUMENTS**

| * | | Document Number Country Code-Number-Kind Code | Date MM-YYYY | Country | Name | CPC 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.

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | **Examiner** | **Art Unit** |
| | BINH TIEU | 2656 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| ✓ | Rejected | - | Cancelled | N | Non-Elected | A | Appeal |
| = | Allowed | ÷ | Restricted | I | Interference | O | Objected |

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

| CLAIM | | DATE | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Final | Original | 07/07/2016 | | | | | | | | |
| | 1 | = | | | | | | | | |
| | 2 | = | | | | | | | | |
| | 3 | = | | | | | | | | |
| | 4 | = | | | | | | | | |
| | 5 | = | | | | | | | | |
| | 6 | = | | | | | | | | |
| | 7 | = | | | | | | | | |
| | 8 | = | | | | | | | | |
| | 9 | = | | | | | | | | |
| | 10 | = | | | | | | | | |
| | 11 | = | | | | | | | | |
| | 12 | = | | | | | | | | |
| | 13 | = | | | | | | | | |
| | 14 | = | | | | | | | | |
| | 15 | = | | | | | | | | |
| | 16 | ✓ | | | | | | | | |
| | 17 | O | | | | | | | | |
| | 18 | ✓ | | | | | | | | |
| | 19 | ✓ | | | | | | | | |
| | 20 | O | | | | | | | | |

| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14988350 | DEORA ET AL. |
| | Examiner | Art Unit |
| | BINH TIEU | 2656 |

| CPC- SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| H04M 2201/40, 2203/251, 2203/352, 2203/353, 3/2209, 1/64, 3/493 | 07/07/2016 | /BKT/ |
| H04L 51/04, 51/32 | 07/07/2016 | /BKT/ |
| G06Q 10/10 | 07/07/2016 | /BKT/ |

| CPC COMBINATION SETS - SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| | | |

| US CLASSIFICATION SEARCHED | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| 379/ | 88.19, 88.2, 93.17, 93.23, 142.01, 142.06, 142.09, 142.14, 142.17, 245, 247 | 07/07/2016 | /BKT/ |

| SEARCH NOTES | | |
|---|---|---|
| Search Notes | Date | Examiner |
| WEST DATABASES TERMS SEARCHES | 07/07/2016 | /BKT/ |

| INTERFERENCE SEARCH | | | |
|---|---|---|---|
| US Class/ CPC Symbol | US Subclass / CPC Group | Date | Examiner |
| | | | |

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

PTO/SB/08a (03-15)
Approved for use through 07/31/2016. 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 | |
| Filing Date | |
| First Named Inventor | Deora, Gautam |
| Art Unit | |
| Examiner Name | |
| Attorney Docket Number | 358721.01 |

| 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 |
| /BT/ | 1 | 9117447 | B2 | 2015-08-25 | Gruber, et al. | |
| /BT/ | 2 | 8731942 | B2 | 2014-05-20 | Cheyer, et al. | |
| /BT/ | 3 | 7818176 | B2 | 2010-10-19 | Freeman, et al. | |
| /BT/ | 4 | 8296383 | B2 | 2012-10-23 | Lindahl, Aram M. | |
| /BT/ | 5 | 8117268 | B2 | 2012-02-14 | Jablokov, et al. | |
| /BT/ | 6 | 8660847 | B2 | 2014-02-25 | Soemo, et al. | |
| /BT/ | 7 | 7324947 | B2 | 2008-01-29 | Jordan, et al. | |
| /BT/ | 8 | 6078914 | A | 2000-06-20 | Redfern, Darren M. | |

| INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99) | | |
|---|---|---|
| | Application Number | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

| | | | | | | |
|---|---|---|---|---|---|---|
| /BT/ | 9 | 7640160 | B2 | 2009-12-29 | Di Cristo, et al. | |
| /BT/ | 10 | 7302280 | B2 | 2007-11-27 | Hinckley, et al. | |
| /BT/ | 11 | 8275618 | B2 | 2012-09-25 | Ganong, William F. | |

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 |
|---|---|---|---|---|---|---|
| /BT/ | 1 | 20080091426 | A1 | 2008-04-17 | Rempel, 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 | | | | | | | ☐ |

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] |
|---|---|---|---|
| /BT/ | 1 | NAPIERSKI, JASON, "Speech Analytics: the Key to Extracting Valuable Data from Calls", Published on: May 02, 2014 Available at: http://callminer.com/speech-analytics-key-extracting-valuable-data-calls/ | ☐ |

| INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99) | | |
|---|---|---|
| | Application Number | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

| | | | |
|---|---|---|---|
| /BT/ | 2 | WOOLLASTON, VICTORIA, "The app that lets deaf people 'hear' phone calls. Pedius converts speech to text in real time", Published on: February 23, 2015<br>Available at:<br>http://www.dailymail.co.uk/sciencetech/article-2965063/The-app-lets-deaf-people-hear-phone-calls-Pedius-converts-speech-text-real-time.html | ☐ |

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

**EXAMINER SIGNATURE**

| Examiner Signature | /Binh Kien Tieu/ | Date Considered | 07/07/2016 |
|---|---|---|---|

*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 | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

**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 | /John T Kalnay/ | Date (YYYY-MM-DD) | 2016-01-05 |
| Name/Print | John T Kalnay | Registration Number | 46816 |

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.**

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

# BIB DATA SHEET

**CONFIRMATION NO. 7481**

| SERIAL NUMBER | FILING or 371(c) DATE<br>RULE | CLASS | GROUP ART UNIT | ATTORNEY DOCKET NO. |
|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | 379 | 2656 | 358721.01 |

**APPLICANTS**

Microsoft Technology Licensing, LLC, Redmond, WA;

**INVENTORS**

Gautam Deora, Hyderabad, INDIA;
Vikas Verma, Hyderabad, INDIA;
Saumya Chandra, Hyderabad, INDIA;
Manoj Lalavat, Hyderabat, INDIA;
Sonia Singh, Hyderabad, INDIA;
Badhri Ravikumar, Hyderabad, INDIA;
Anushree Bansal, Hyderabad, INDIA;
Snehita Peddi, Hyderabad, INDIA;

**** CONTINUING DATA ***************************

**** FOREIGN APPLICATIONS ***************************

**** IF REQUIRED, FOREIGN FILING LICENSE GRANTED ****
02/01/2016

| Foreign Priority claimed ☐ Yes ☑ No<br>35 USC 119(a-d) conditions met ☐ Yes ☑ No<br>Verified and Acknowledged /BINH KIEN TIEU/ Examiner's Signature | ☐ Met after Allowance<br>/BKT/ Initials | STATE OR COUNTRY | SHEETS DRAWINGS | TOTAL CLAIMS | INDEPENDENT CLAIMS |
|---|---|---|---|---|---|
| | | INDIA | 8 | 20 | 3 |

**ADDRESS**

MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052
UNITED STATES

**TITLE**

Cross Device Companion Application For Phone

| FILING FEE RECEIVED | | |
|---|---|---|
| 1600 | FEES: Authority has been given in Paper<br>No._____ to charge/credit DEPOSIT ACCOUNT<br>No._____ for following: | ☐ All Fees<br>☐ 1.16 Fees (Filing)<br>☐ 1.17 Fees (Processing Ext. of time)<br>☐ 1.18 Fees (Issue)<br>☐ Other _____<br>☐ Credit |

# WEST Search History for Application 14988350

## Creation Date: 2016070718:42

## Prior Art Searches

| Query | DB | Hits | Op. | Plur. | Thes. | Date |
|---|---|---|---|---|---|---|
| **text-based with transcript** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 140 | ADJ | YES | | 07-07-2016 |
| **(telephone or phone)(call or communication)** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 247795 | ADJ | YES | | 07-07-2016 |
| **((telephone or phone)(call or communication) ) same (text-based with transcript )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 8 | ADJ | YES | | 07-07-2016 |
| **related same content same application** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 147350 | ADJ | YES | | 07-07-2016 |
| **(related same content same application ) same ((telephone or phone)(call or communication) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 457 | ADJ | YES | | 07-07-2016 |
| **natural language or nlp** | PGPB, USPT, USOC, | 45084 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 223 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | EPAB, JPAB, DWPI, TDBD | | | | | |
| **(natural language or nlp ) and (related same content same application same (telephone or phone)(call or communication) )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 44 | ADJ | YES | | 07-07-2016 |
| **(natural language or nlp and related same content same application same (telephone or phone)(call or communication) ) and text-based** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 8 | ADJ | YES | | 07-07-2016 |
| **(natural language or nlp and related same content same application same (telephone or phone)(call or communication) and text-based ) not ((telephone or phone)(call or communication) same text-based with transcript )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 8 | ADJ | YES | | 07-07-2016 |
| **(text-based with transcript ) same call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 15 | ADJ | YES | | 07-07-2016 |
| **(text-based with transcript same call ) not ((telephone or phone)(call or communication) same text-based with transcript )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 7 | ADJ | YES | | 07-07-2016 |
| **intention** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 422308 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 224 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **(intention ) and (text-based with transcript same call not (telephone or phone)(call or communication) same text-based with transcript )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 07-07-2016 |
| **personal same business same call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 7533 | ADJ | YES | | 07-07-2016 |
| **(personal same business same call ) and (related same content same application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 647 | ADJ | YES | | 07-07-2016 |
| **text-based with call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 1403 | ADJ | YES | | 07-07-2016 |
| **(text-based with call ) and (personal same business same call and related same content same application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 6 | ADJ | YES | | 07-07-2016 |
| **(text-based with transcript ) and ((telephone or phone)(call or communication) ) and (related same content same application ) and (natural language or nlp )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 11 | ADJ | YES | | 07-07-2016 |
| **(text-based with call and personal same business same call and related same content same application ) or (text-based with transcript same call )** | PGPB, USPT, USOC, EPAB, | 21 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 225 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | JPAB, DWPI, TDBD | | | | | |
| **(text-based with transcript and (telephone or phone)(call or communication) and related same content same application and natural language or nlp ) not (text-based with call and personal same business same call and related same content same application or text-based with transcript same call )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 10 | ADJ | YES | | 07-07-2016 |
| **relevant content** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 17952 | ADJ | YES | | 07-07-2016 |
| **(relevant content ) same application** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 3711 | ADJ | YES | | 07-07-2016 |
| **(display$3 or present$3) same (relevant content same application )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 1295 | ADJ | YES | | 07-07-2016 |
| **((display$3 or present$3) same relevant content same application ) and (text-based with call )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 07-07-2016 |
| **((display$3 or present$3) same relevant content same application ) and (natural language or nlp )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 134 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 226 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| **text with call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 66783 | ADJ | YES | | 07-07-2016 |
| **(text with call ) and ((display$3 or present$3) same relevant content same application and natural language or nlp )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 69 | ADJ | YES | | 07-07-2016 |
| **"during" with call** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 138693 | ADJ | YES | | 07-07-2016 |
| **("during" with call ) and (text with call and (display$3 or present$3) same relevant content same application and natural language or nlp )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 57 | ADJ | YES | | 07-07-2016 |
| **cloud** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 283782 | ADJ | YES | | 07-07-2016 |
| **(cloud ) and ("during" with call and text with call and (display$3 or present$3) same relevant content same application and natural language or nlp )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 0 | ADJ | YES | | 07-07-2016 |
| **soroca.in.** | PGPB, USPT, USOC, EPAB, | 763 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 227 of 304

| | | | | | | |
|---|---|---|---|---|---|---|
| | JPAB, DWPI, TDBD | | | | | |
| **("during" with call and text with call and (display$3 or present$3) same relevant content same application and natural language or nlp ) not (soroca.in. )** | PGPB, USPT, USOC, EPAB, JPAB, DWPI, TDBD | 2 | ADJ | YES | | 07-07-2016 |



Patent Owner Ex. 2102
Page 228 of 304

## PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number: 14/988,350

### 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 | | | N/A | 280 |
| SEARCH FEE (37 CFR 1.16(k), (i), or (m)) | N/A | N/A | N/A | | | N/A | 600 |
| EXAMINATION FEE (37 CFR 1.16(o), (p), or (q)) | N/A | N/A | N/A | | | N/A | 720 |
| TOTAL CLAIMS (37 CFR 1.16(i)) | 20 minus 20 = | * | | | OR | x 80 = | 0.00 |
| INDEPENDENT CLAIMS (37 CFR 1.16(h)) | 3 minus 3 = | * | | | | x 420 = | 0.00 |
| 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 | | | TOTAL | 1600 |

### 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($) | ADDITIONAL FEE($) | | 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.

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 | GRP ART UNIT | FIL FEE REC'D | ATTY.DOCKET.NO | TOT CLAIMS | IND CLAIMS |
|---|---|---|---|---|---|---|
| 14/988,350 | 01/05/2016 | 2656 | 1600 | 358721.01 | 20 | 3 |

**CONFIRMATION NO. 7481**

69316
MICROSOFT CORPORATION
ONE MICROSOFT WAY
REDMOND, WA 98052

**FILING RECEIPT**

OC000000080247556

Date Mailed: 02/04/2016

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)**

Gautam Deora, Hyderabad, INDIA;
Vikas Verma, Hyderabad, INDIA;
Saumya Chandra, Hyderabad, INDIA;
Manoj Lalavat, Hyderabat, INDIA;
Sonia Singh, Hyderabad, INDIA;
Badhri Ravikumar, Hyderabad, INDIA;
Anushree Bansal, Hyderabad, INDIA;
Snehita Peddi, Hyderabad, INDIA;

**Applicant(s)**

Microsoft Technology Licensing, LLC, Redmond, WA;

**Power of Attorney:** The patent practitioners associated with Customer Number 69316

**Domestic Applications for which benefit is claimed - None.**
*A proper domestic benefit claim must be provided in an Application Data Sheet in order to constitute a claim for domestic benefit. See 37 CFR 1.76 and 1.78.*

**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 Application via Priority Document Exchange:** Yes

**Permission to Access Search Results:** No

Applicant may provide or rescind an authorization for access using Form PTO/SB/39 or Form PTO/SB/69 as appropriate.

**If Required, Foreign Filing License Granted:** 02/01/2016

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 14/988,350**

**Projected Publication Date:** 07/06/2017

**Non-Publication Request:** No

**Early Publication Request:** No

**Title**

Cross Device Companion Application For Phone

**Preliminary Class**

379

**Statement under 37 CFR 1.55 or 1.78 for AIA (First Inventor to File) Transition Applications:** No

## 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.

The grant of a license does not in any way lessen the responsibility of a licensee for the security of the subject matter as imposed by any Government contract or the provisions of existing laws relating to espionage and the national security or the export of technical data. Licensees should apprise themselves of current regulations especially with respect to certain countries, of other agencies, particularly the Office of Defense Trade Controls, Department of State (with respect to Arms, Munitions and Implements of War (22 CFR 121-128)); the Bureau of Industry and Security, Department of Commerce (15 CFR parts 730-774); the Office of Foreign AssetsControl, Department of Treasury (31 CFR Parts 500+) and the Department of Energy.

**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).

---

## *SelectUSA*

The United States represents the largest, most dynamic marketplace in the world and is an unparalleled location for business investment, innovation, and commercialization of new technologies. The U.S. offers tremendous resources and advantages for those who invest and manufacture goods here. Through SelectUSA, our nation works to promote and facilitate business investment. SelectUSA provides information assistance to the international investor community; serves as an ombudsman for existing and potential investors; advocates on behalf of U.S. cities, states, and regions competing for global investment; and counsels U.S. economic development organizations on investment attraction best practices. To learn more about why the United States is the best country in the world to develop

technology, manufacture products, deliver services, and grow your business, visit http://www.SelectUSA.gov or call +1-202-482-6800.

Doc Code: PA..

Document Description: Power of Attorney

PTO/AIA/82A (07-13)

Approved for use through 11/30/2014. 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.

# TRANSMITTAL FOR POWER OF ATTORNEY TO ONE OR MORE REGISTERED PRACTITIONERS

NOTE: This form is to be submitted with the Power of Attorney by Applicant form (PTO/AIA/82B or equivalent) to identify the application to which the Power of Attorney is directed, in accordance with 37 CFR 1.5. If the Power of Attorney by Applicant form is not accompanied by this transmittal form or an equivalent, the Power of Attorney will not be recognized in the application.

| | |
|---|---|
| Application Number | |
| Filing Date | January 5, 2016 |
| First Named Inventor | Gautam Deora |
| Title | Cross Device Companion Application For Phone |
| Art Unit | |
| Examiner Name | |
| Attorney Docket Number | 358721.01 |

**SIGNATURE of Applicant or Patent Practitioner**

| | | | |
|---|---|---|---|
| Signature | /John Kalnay/ | Date | January 5, 2016 |
| Name | John Kalnay | Telephone | 216-308-3245 |
| Registration Number | 46,816 | | |

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

☐ *Total of _____ forms are submitted.

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.**

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

Doc Code: PA..
Document Description: Power of Attorney

PTO/AIA/82B (07-13)
Approved for use through 11/30/2014. 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 displays a valid OMB control number

# POWER OF ATTORNEY BY APPLICANT

I hereby revoke all previous powers of attorney given in the application identified in either the attached transmittal letter or the boxes below.

| Application Number | Filing Date |
|---|---|
| | |

(Note: The boxes above may be left blank if information is provided on form PTO/AIA/82A.)

☑ I hereby appoint the Patent Practitioner(s) associated with the following Customer Number as my/our attorney(s) or agent(s), and to transact all business in the United States Patent and Trademark Office connected therewith for the application referenced in the attached transmittal letter (form PTO/AIA/82A) or identified above

69316

OR

☐ I hereby appoint Practitioner(s) named in the attached list (form PTO/AIA/82C) as my/our attorney(s) or agent(s), and to transact all business in the United States Patent and Trademark Office connected therewith for the patent application referenced in the attached transmittal letter (form PTO/AIA/82A) or identified above. (Note: Complete form PTO/AIA/82C.)

**Please recognize or change the correspondence address for the application identified in the attached transmittal letter or the boxes above to:**

☐ The address associated with the above-mentioned Customer Number

OR

☑ The address associated with Customer Number: 69316

OR

| | | | | | |
|---|---|---|---|---|---|
| Firm or Individual Name | | | | | |
| Address | | | | | |
| City | | State | | Zip | |
| Country | | | | | |
| Telephone | | Email | | | |

I am the Applicant (if the Applicant is a juristic entity, list the Applicant name in the box):

Microsoft Technology Licensing, LLC

☐ Inventor or Joint Inventor (title not required below)

☐ Legal Representative of a Deceased or Legally Incapacitated Inventor (title not required below)

☑ Assignee or Person to Whom the Inventor is Under an Obligation to Assign (provide signer's title if applicant is a juristic entity)

☐ Person Who Otherwise Shows Sufficient Proprietary Interest (e.g., a petition under 37 CFR 1.46(b)(2) was granted in the application or is concurrently being filed with this document) (provide signer's title if applicant is a juristic entity)

**SIGNATURE of Applicant for Patent**

The undersigned (whose title is supplied below) is authorized to act on behalf of the applicant (e.g., where the applicant is a juristic entity).

| | | | |
|---|---|---|---|
| Signature | | Date (Optional) | |
| Name | Benjamin C. Rodorff | | |
| Title | Secretary | | |

NOTE: Signature - This form must be signed by the applicant in accordance with 37 CFR 1.33. See 37 CFR 1.4 for signature requirements and certifications. If more than one applicant, use multiple forms.

☐ Total of forms are submitted.

This collection of information is required by 37 CFR 1.131, 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.

*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

| | |
|---|---|
| First Named Inventor: Gautam Deora | Attorney Docket No.: 358721.01 |
| Application No.: New Application | Group Art Unit: Not Yet Assigned |
| Filed: Herewith | Confirmation Number: Not Yet Assigned |
| Customer No.: 69316 | Examiner: Not Yet Assigned |

Title: CROSS DEVICE COMPANION APP FOR PHONE

Commissioner for Patents
P.O. Box 1450
Alexandria VA 22313-1450

STATEMENT FILED PURSUANT TO
THE DUTY OF DISCLOSURE UNDER 37 C.F.R. §§ 1.56, 1.97 AND 1.98

Commissioner:

Pursuant to the duty of disclosure under 37 C.F.R. §§ 1.56, 1.97 and 1.98, the Applicant requests consideration of this Information Disclosure Statement.

PART I: Compliance with 37 C.F.R. § 1.97

This Information Disclosure Statement has been filed within three (3) months of the filing date of a National Application.

No fee or certification is required.

PART II: Additional Information

The Applicant hereby makes the following additional information of record in the above-identified application.

| Serial No. | Filing Date | Inventor(s) |
|---|---|---|
| N/A | N/A | N/A |



Patent Owner Ex. 2102
Page 236 of 304

PART III: Remarks

The Applicant hereby makes of record in the above-identified application the information listed on the attached form PTO/SB/08A. The order of presentation of the references should not be construed as an indication of the importance of the references. Documents cited on the attached form PTO/SB/08A are enclosed unless otherwise indicated. It is respectfully requested that:

1. The Examiner consider completely the cited information, along with any other information, in reaching a determination concerning the patentability of the present claims;

2. The enclosed form PTO/SB/08A be signed by the Examiner to evidence that the cited information has been fully considered by the Patent and Trademark Office during the examination of this application;

3. The citations for the information be printed on any patent which issues from this application.

By submitting this Information Disclosure Statement, the Applicant makes no representation that a search has been performed, of the extent of any search performed, or that more relevant information does not exist.

By submitting this Information Disclosure Statement, the Applicant makes no representation that the information cited in the Statement is, or is considered to be, material to patentability as defined in 37 C.F.R. § 1.56(b).

By submitting this Information Disclosure Statement, the Applicant makes no representation that the information cited in the Statement is, or is considered to be, in fact, prior art as defined by 35 U.S.C. § 102.



Patent Owner Ex. 2102
Page 237 of 304

Notwithstanding any statement by the Applicant, the Applicant urges the Examiner to form his or her own conclusion regarding the relevance of the cited information. An early and favorable action is hereby requested.

Respectfully submitted,

Date Jan 5, 2016

By: /J. T. Kalnay/

John T Kalnay

Reg. No. 46816

Microsoft Technology Licensing, LLC

One Microsoft Way

Redmond WA 98052-6399

Direct telephone (425) 707-9382

**CERTIFICATE OF MAILING OR TRANSMISSION**
**(Under 37 CFR § 1.8(a)) or ELECTRONIC FILING**

I hereby certify that this correspondence is being electronically deposited with the USPTO via EFS-Web on the date shown below:

1-5-16

Date

/J. T. Kalnay/

Signature

John T. Kalnay

Printed Name

PTO/SB/08a (03-15)
Approved for use through 07/31/2016. 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 | |
| Filing Date | |
| First Named Inventor | Deora, Gautam |
| Art Unit | |
| Examiner Name | |
| Attorney Docket Number | 358721.01 |

**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 | 9117447 | B2 | 2015-08-25 | Gruber, et al. | |
| | 2 | 8731942 | B2 | 2014-05-20 | Cheyer, et al. | |
| | 3 | 7818176 | B2 | 2010-10-19 | Freeman, et al. | |
| | 4 | 8296383 | B2 | 2012-10-23 | Lindahl, Aram M. | |
| | 5 | 8117268 | B2 | 2012-02-14 | Jablokov, et al. | |
| | 6 | 8660847 | B2 | 2014-02-25 | Soemo, et al. | |
| | 7 | 7324947 | B2 | 2008-01-29 | Jordan, et al. | |
| | 8 | 6078914 | A | 2000-06-20 | Redfern, Darren M. | |

| INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99) | | |
|---|---|---|
| | Application Number | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

| | | | | | | |
|---|---|---|---|---|---|---|
| | 9 | 7640160 | B2 | 2009-12-29 | Di Cristo, et al. | |
| | 10 | 7302280 | B2 | 2007-11-27 | Hinckley, et al. | |
| | 11 | 8275618 | B2 | 2012-09-25 | Ganong, William F. | |

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 | 20080091426 | A1 | 2008-04-17 | Rempel, 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 | | | | | | | ☐ |

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] |
|---|---|---|---|
| | 1 | NAPIERSKI, JASON. "Speech Analytics: the Key to Extracting Valuable Data from Calls", Published on: May 02, 2014 Available at: http://callminer.com/speech-analytics-key-extracting-valuable-data-calls/ | ☐ |

| INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99) | | |
|---|---|---|
| | Application Number | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

| | | | |
|---|---|---|---|
| | 2 | WOOLLASTON, VICTORIA, "The app that lets deaf people 'hear' phone calls Pedius converts speech to text in real time", Published on: February 23, 2015<br>Available at:<br>http://www.dailymail.co.uk/sciencetech/article-2965063/The-app-lets-deaf-people-hear-phone-calls-Pedius-converts-speech-text-real-time.html | ☐ |

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 | |
| | Filing Date | |
| | First Named Inventor | Deora, Gautam |
| | Art Unit | |
| | Examiner Name | |
| | Attorney Docket Number | 358721.01 |

**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 | | Date (YYYY-MM-DD) | 2016-01-05 |
|---|---|---|---|
| Name/Print | John T Kalnay | Registration Number | 46816 |

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:** | |
| **Filing Date:** | |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Filer:** | John Kalnay |
| **Attorney Docket Number:** | 358721.01 |

Filed as Large Entity

**Filing Fees for Utility under 35 USC 111(a)**

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Basic Filing:** | | | | |
| Utility application filing | 1011 | 1 | 280 | 280 |
| Utility Search Fee | 1111 | 1 | 600 | 600 |
| Utility Examination Fee | 1311 | 1 | 720 | 720 |
| **Pages:** | | | | |
| **Claims:** | | | | |
| **Miscellaneous-Filing:** | | | | |
| **Petition:** | | | | |
| **Patent-Appeals-and-Interference:** | | | | |

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Post-Allowance-and-Post-Issuance:** | | | | |
| **Extension-of-Time:** | | | | |
| **Miscellaneous:** | | | | |
| | | | **Total in USD ($)** | **1600** |

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 24532512 |
| **Application Number:** | 14988350 |
| **International Application Number:** | |
| **Confirmation Number:** | 7481 |
| **Title of Invention:** | Cross Device Companion Application For Phone |
| **First Named Inventor/Applicant Name:** | Gautam Deora |
| **Customer Number:** | 69316 |
| **Filer:** | John Kalnay |
| **Filer Authorized By:** | |
| **Attorney Docket Number:** | 358721.01 |
| **Receipt Date:** | 05-JAN-2016 |
| **Filing Date:** | |
| **Time Stamp:** | 16:37:02 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | yes |
| Payment Type | Credit Card |
| Payment was successfully received in RAM | $1600 |
| RAM confirmation Number | 3161 |
| Deposit Account | |
| Authorized User | |

The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows:

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | | 358721-01-AppAsFiled-Jan5-2016.PDF | 23361883<br>003a39165b363fc735388ae49632041bb4d8e965 | yes | 72 |

**Multipart Description/PDF files in .zip description**

| Document Description | Start | End |
|---|---|---|
| Application Data Sheet | 1 | 8 |
| Specification | 9 | 34 |
| Claims | 35 | 40 |
| Abstract | 41 | 41 |
| Drawings-only black and white line drawings | 42 | 49 |
| Oath or Declaration filed | 50 | 57 |
| Power of Attorney | 58 | 59 |
| Transmittal Letter | 60 | 62 |
| Information Disclosure Statement (IDS) Form (SB08) | 63 | 66 |
| Non Patent Literature | 67 | 68 |
| Non Patent Literature | 69 | 72 |

**Warnings:**

**Information:**

| | | | | | |
|---|---|---|---|---|---|
| 2 | Fee Worksheet (SB06) | fee-info.pdf | 34569<br>67b7099ff41c955db5d7bc80fd7426886834396 | no | 2 |

**Warnings:**

**Information:**

| | |
|---|---|
| **Total Files Size (in bytes):** | 23396452 |

**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/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721 01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

The application data sheet is part of the provisional or nonprovisional application for which it is being submitted. The following form contains the bibliographic data arranged in a format specified by the United States Patent and Trademark Office as outlined in 37 CFR 1.76.
This document may be completed electronically and submitted to the Office in electronic format using the Electronic Filing System (EFS) or the document may be printed and included in a paper filed application.

## Secrecy Order 37 CFR 5.2

☐ Portions or all of the application associated with this Application Data Sheet may fall under a Secrecy Order pursuant to 37 CFR 5.2 (Paper filers only. Applications that fall under Secrecy Order may not be filed electronically.)

## Inventor Information:

**Inventor 1** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Gautam | | Deora | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence i | IN |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country i | US |

**Inventor 2** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Vikas | | Verma | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence i | IN |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country i | US |

**Inventor 3** Remove

**Legal Name**

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Saumya | | Chandra | |

Residence Information (Select One) ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence | IN |
|---|---|---|---|

Mailing Address of Inventor:

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country | US |

Inventor 4 Remove

Legal Name

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Manoj | | Lalavat | |

Residence Information (Select One) ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence | IN |
|---|---|---|---|

Mailing Address of Inventor:

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country | US |

Inventor 5 Remove

Legal Name

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Sonia | | Singh | |

Residence Information (Select One) ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence | IN |
|---|---|---|---|

Mailing Address of Inventor:

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country | US |

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

**Inventor 6** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Badhri | | Ravikumar | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence [i] | IN |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country [i] | US |

**Inventor 7** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Anushree | | Bansal | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence [i] | IN |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | C/O Microsoft Corporation | | |
|---|---|---|---|
| Address 2 | One Microsoft Way | | |
| City | Redmond | State/Province | WA |
| Postal Code | 98052 | Country [i] | US |

**Inventor 8** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Snehita | | Peddi | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Hyderabad | Country of Residence [i] | IN |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | C/O Microsoft Corporation |
|---|---|
| Address 2 | One Microsoft Way |

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

| City | Redmond | State/Province | WA |
|---|---|---|---|
| Postal Code | 98052 | Country i | US |

All Inventors Must Be Listed - Additional Inventor Information blocks may be generated within this form by selecting the **Add** button. Add

## Correspondence Information:

**Enter either Customer Number or complete the Correspondence Information section below.**
**For further information see 37 CFR 1.33(a).**

☐ **An Address is being provided for the correspondence Information of this application.**

| Customer Number | 69316 | | |
|---|---|---|---|
| Email Address | | Add Email | Remove Email |

## Application Information:

| Title of the Invention | Cross Device Companion Application For Phone | | |
|---|---|---|---|
| Attorney Docket Number | 358721.01 | Small Entity Status Claimed | ☐ |
| Application Type | Nonprovisional | | |
| Subject Matter | Utility | | |
| Total Number of Drawing Sheets (if any) | 8 | Suggested Figure for Publication (if any) | 1 |

### Filing By Reference :

Only complete this section when filing an application by reference under 35 U.S.C. 111(c) and 37 CFR 1.57(a). Do not complete this section if application papers including a specification and any drawings are being filed. Any domestic benefit or foreign priority information must be provided in the appropriate section(s) below (i.e., "Domestic Benefit/National Stage Information" and "Foreign Priority Information").

For the purposes of a filing date under 37 CFR 1.53(b), the description and any drawings of the present application are replaced by this reference to the previously filed application, subject to conditions and requirements of 37 CFR 1.57(a).

| Application number of the previously filed application | Filing date (YYYY-MM-DD) | Intellectual Property Authority or Country |
|---|---|---|
| | | |

## Publication Information:

☐ Request Early Publication (Fee required at time of Request 37 CFR 1.219)

☐ **Request Not to Publish.** I hereby request that the attached application not be published under 35 U.S.C. 122(b) and certify that the invention disclosed in the attached application **has not and will not** be the subject of an application filed in another country, or under a multilateral international agreement, that requires publication at eighteen months after filing.

## Representative Information:

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

Representative information should be provided for all practitioners having a power of attorney in the application. Providing this information in the Application Data Sheet does not constitute a power of attorney in the application (see 37 CFR 1.32).
Either enter Customer Number or complete the Representative Name section below. If both sections are completed the customer Number will be used for the Representative Information during processing.

| Please Select One: | (•) Customer Number | ( ) US Patent Practitioner | ( ) Limited Recognition (37 CFR 11.9) |
|---|---|---|---|
| Customer Number | 69316 | | |

## Domestic Benefit/National Stage Information:

This section allows for the applicant to either claim benefit under 35 U.S.C. 119(e), 120, 121, or 365(c) or indicate National Stage entry from a PCT application. Providing this information in the application data sheet constitutes the specific reference required by 35 U.S.C. 119(e) or 120, and 37 CFR 1.78.
When referring to the current application, please leave the application number blank.

| Prior Application Status | | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | | | |

Additional Domestic Benefit/National Stage Data may be generated within this form by selecting the **Add** button.

## Foreign Priority Information:

This section allows for the applicant to claim priority to a foreign application. Providing this information in the application data sheet constitutes the claim for priority as required by 35 U.S.C. 119(b) and 37 CFR 1.55(a). When priority is claimed to a foreign application that is eligible for retrieval under the priority document exchange program (PDX)[1] the information will be used by the Office to automatically attempt retrieval pursuant to 37 CFR 1.55(h)(1) and (2). Under the PDX program, applicant bears the ultimate responsibility for ensuring that a copy of the foreign application is received by the Office from the participating foreign intellectual property office, or a certified copy of the foreign priority application is filed, within the time period specified in 37 CFR 1.55(g)(1).

Remove

| Application Number | Country[1] | Filing Date (YYYY-MM-DD) | Access Code[1] (if applicable) |
|---|---|---|---|
| | | | |

Additional Foreign Priority Data may be generated within this form by selecting the **Add** button.

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

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

☐ This application (1) claims priority to or the benefit of an application filed before March 16, 2013 and (2) also contains, or contained at any time, a claim to a claimed invention that has an effective filing date on or after March 16, 2013.
NOTE: By providing this statement under 37 CFR 1.55 or 1.78, this application, with a filing date on or after March 16, 2013, will be examined under the first inventor to file provisions of the AIA.

## Authorization to Permit Access:

☒ Authorization to Permit Access to the Instant Application by the 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 instant patent application is filed access to the instant 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 instant patent application is filed to have access to the instant patent application.

In accordance with 37 CFR 1.14(h)(3), access will be provided to a copy of the instant patent application with respect to: 1) the instant patent application-as-filed; 2) any foreign application to which the instant 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 instant patent application; and 3) any U.S. application-as-filed from which benefit is sought in the instant patent application.

In accordance with 37 CFR 1.14(c), access may be provided to information concerning the date o f filing this Authorization.

## Applicant Information:

Providing assignment information in this section does not substitute for compliance with any requirement of part 3 of Title 37 of CFR to have an assignment recorded by the Office.

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

**Applicant 1**

If the applicant is the inventor (or the remaining joint inventor or inventors under 37 CFR 1.45), this section should not be completed. The information to be provided in this section is the name and address of the legal representative who is the applicant under 37 CFR 1.43; or the name and address of the assignee, person to whom the inventor is under an obligation to assign the invention, or person who otherwise shows sufficient proprietary interest in the matter who is the applicant under 37 CFR 1.46. If the applicant is an applicant under 37 CFR 1.46 (assignee, person to whom the inventor is obligated to assign, or person who otherwise shows sufficient proprietary interest) together with one or more joint inventors, then the joint inventor or inventors who are also the applicant should be identified in this section.

Clear

| | | |
|---|---|---|
| (•) Assignee | ( ) Legal Representative under 35 U.S.C. 117 | ( ) Joint Inventor |
| ( ) Person to whom the inventor is obligated to assign. | ( ) Person who shows sufficient proprietary interest | |

If applicant is the legal representative, indicate the authority to file the patent application, the inventor is:

Name of the Deceased or Legally Incapacitated Inventor :

If the Applicant is an Organization check here. ☒

| Organization Name | Microsoft Technology Licensing, LLC |
|---|---|

**Mailing Address Information For Applicant:**

| | | | |
|---|---|---|---|
| **Address 1** | C/O Microsoft Corporation | | |
| Address 2 | One Microsoft Way | | |
| **City** | Redmond | **State/Province** | WA |
| **Country**[i] | US | Postal Code | 98052 |
| Phone Number | | Fax Number | |
| Email Address | | | |

Additional Applicant Data may be generated within this form by selecting the Add button.

## Assignee Information including Non-Applicant Assignee Information:

Providing assignment information in this section does not subsitute for compliance with any requirement of part 3 of Title 37 of CFR to have an assignment recorded by the Office.

**Assignee 1**

Complete this section if assignee information, including non-applicant assignee information, is desired to be included on the patent application publication . An assignee-applicant identified in the "Applicant Information" section will appear on the patent application publication as an applicant. For an assignee-applicant, complete this section only if identification as an assignee is also desired on the patent application publication.

If the Assignee or Non-Applicant Assignee is an Organization check here. ☐

PTO/AIA/14 (12-13)
Approved for use through 01/31/2014. OMB 0651-0032
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.

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 358721.01 |
|---|---|---|
| | Application Number | |
| Title of Invention | Cross Device Companion Application For Phone | |

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | | | | |

**Mailing Address Information For Assignee including Non-Applicant Assignee:**

| | | | |
|---|---|---|---|
| **Address 1** | | | |
| Address 2 | | | |
| **City** | | **State/Province** | |
| **Country** | | Postal Code | |
| Phone Number | | Fax Number | |
| Email Address | | | |

Additional Assignee or Non-Applicant Assignee Data may be generated within this form by selecting the Add button.

## Signature:

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

| | | | | | |
|---|---|---|---|---|---|
| **Signature** | /John Kalnay/ | | | Date (YYYY-MM-DD) | 2016-01-05 |
| First Name | John | Last Name | Kalnay | Registration Number | 46816 |

Additional Signature may be generated within this form by selecting the Add button.

This collection of information is required by 37 CFR 1.76. 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 23 minutes to complete, including gathering, preparing, and submitting the completed application data sheet 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.**

UNITED STATES PATENT APPLICATION

FOR

# Cross Device Companion Application For Phone

Inventors:

**Gautam Deora**

**Vikas Verma**

**Saumya Chandra**

**Manoj Lalavat**

**Sonia Singh**

**Badhri Ravikumar**

**Anushree Bansal**

**Snehita Peddi**

PREPARED BY:

THE LAW OFFICE OF JT KALNAY, LLC

# Cross Device Companion Application For Phone

## BACKGROUND

**[0001]** Before caller-id, someone receiving a phone call had no idea who was calling. After caller-id, the recipient might have known who was calling, but wouldn't have known why. Even if the recipient knew who was calling and why, the recipient still might have had to take several actions to find documents and applications that were relevant to the phone call. Thus, phone calls were often seen as intrusions and may have been ignored rather than answered because the recipient had neither the time nor inclination to experience a context shift.

**[0002]** Conventionally, information stored on the receiving phone or elsewhere (e.g., telecommunications server, cloud, application) may have facilitated partially setting the context for a phone call. For example, when a call was received for which a calling number was available, the familiar caller-id feature may have been employed. In another example, when a call was received from a number for which identifying information had been stored, then that identifying information (e.g., name, photo, business) may have been displayed. The identifying information may have helped the user decide whether to answer the phone. Additionally, the identifying information may have helped the user switch between mental tasks. For example a user may have switched from thinking about a business matter to thinking about a family matter. The identifying information may also have helped the parties to the call save time since they may not have needed to identify each other. For example, if the person receiving the call already knew that the call was from their daughter, then the person receiving the call could have answered "hello Emma" instead of simply saying "hello." Answering by name may have saved time because it established in the caller's mind that the person receiving the call already knew their identity.

## SUMMARY

**[0003]** This Summary is provided to introduce, in a simplified form, a selection of concepts that are further described below in the Detailed Description. This Summary is not intended to identify key features or essential features of the claimed

subject matter, nor is it intended to be used to limit the scope of the claimed subject matter.

**[0004]** Example apparatus and methods facilitate establishing context for an incoming phone call. The context goes beyond conventional systems like caller id that rely only on information stored on the receiving device or elsewhere (e.g., telecommunications server) that can be retrieved based on a telephone number or other identifier associated with an incoming call. Example apparatus and methods facilitate providing additional context by identifying not just a party, but an intention (e.g., family matter, business matter) for a call and an action (e.g., make appointment, make purchase) to be taken in response to the call. The intention and action may be parsed out of a speech-to-text transcript of the phone call provided during the phone call. Once the intention and actions are identified, applications and content that are relevant to the phone call may be identified and automatically surfaced on devices available to the recipient or caller. Thus, rather than having to manually search for content and applications to display or edit the content, while talking on the phone, the content and applications may be automatically presented. Additionally, a to-do list of actions to be taken following the phone call may be automatically generated.

**[0005]** Example apparatus and methods use information about a party to a call to gather contextual information and to present that contextual information on, for example, a desktop or other related devices during and after a phone call. A computing device(s) may be controlled to display relevant content and a relevant application for a phone call during the phone call. A logic (e.g., circuit, hardware, firmware) may identify a party on the phone call based, at least in part, on data received from a phone used by the party. Information about the caller may be acquired and displayed. For example, documents recently accessed by the caller, social media posts accessed by the caller, searches performed by the caller, or other information may be accessed and selectively displayed. Another logic may identify the relevant content and the relevant application based, at least in part, on text provided in a text-based transcript of the phone call. The text-based transcript may be provided in real time by a natural language processing (NLP) service during the phone call. The content and relevant application may also be identified by the documents/posts/searches/etc. identified for the caller. Another logic may control

the device(s) to selectively present the relevant content and the relevant application. Content or applications that are accessed during the phone call may be tracked. A to-do list may be presented after the call. The to-do list may remind a party to the call of an action to be taken after the call. For example, a party may be reminded to make another call, to send an email, to make or keep an appointment, or other action.

## BRIEF DESCRIPTION OF THE DRAWINGS

**[0006]** The accompanying drawings illustrate various example apparatus, methods, and other embodiments described herein. It will be appreciated that the illustrated element boundaries (e.g., boxes, groups of boxes, or other shapes) in the figures represent one example of the boundaries. In some examples, one element may be designed as multiple elements or multiple elements may be designed as one element. In some examples, an element shown as an internal component of another element may be implemented as an external component and vice versa. Furthermore, elements may not be drawn to scale.

**[0007]** Figure 1 illustrates an example environment associated with a phone call.

**[0008]** Figure 2 illustrates another example environment associated with a phone call.

**[0009]** Figure 3 illustrates an example method associated with phone call context setting by a cross device companion application.

**[0010]** Figure 4 illustrates an example method associated with phone call context setting by a cross device companion application.

**[0011]** Figure 5 illustrates an example apparatus associated with phone call context setting by a cross device companion application.

**[0012]** Figure 6 illustrates an example apparatus associated with phone call context setting by a cross device companion application.

**[0013]** Figure 7 illustrates an example cloud operating environment associated with phone call context setting by a cross device companion application.

[0014] Figure 8 illustrates an example mobile computing device configured to participate in context setting by a cross device companion application.

## DETAILED DESCRIPTION

[0015] A busy person who receives a phone call may end up asking themselves "who am I talking to?" "why am I talking to them?" "what do I need to look up or what do I need in front of me on the computer to answer this call?" "what do I need to do in response to this call?" and other questions. Conventionally, the busy person might need to stop what they're doing, search through their computer(s) to find documents, content, applications, or other items to answer the call. Conventionally, the busy person might need to remember what to do after the call is over and write down a note. If the call is a lengthy call, the to-do list may only include items that the busy person actually remembers, leaving some items off the list. Example apparatus and methods facilitate establishing context for a phone call, which answers the questions of "who am I talking to" and "why am I talking to them?" Example apparatus and methods also facilitate identifying intentions and actions for a phone call, which in turn facilitates answering the question "what do I need to look up to answer this call?" Example apparatus and methods may also track an entire call so that a to-do list includes all the relevant action items, not just the few that the busy person might remember and write down.

[0016] Consider a busy computer programmer standing at their desk working on a complicated device driver. The programmer's cell phone may ring and caller-id may reveal that it is the programmer's wife calling. The programmer knows that he has to answer the call because his wife is a doctor who is even more busy than the programmer and earlier that day she'd sent him an email that informed him that she was going to call him with some instructions for picking up the children. Conventionally, the programmer might have to minimize his code windows and manually bring up some other applications (e.g., email, calendar, map search) so that he could remind himself of why his wife was calling, so he could figure out what time he was going to be free later in the afternoon, and so he would be able to store the address his wife was going to give him. This was if he even remembered why she was going to call in the first place.



Patent Owner Ex. 2102
Page 260 of 304

[0017] Example applications and methods may identify that it is the programmer's wife that is calling, may automatically display her earlier email, and may determine that the call is a family matter and that she is likely calling about picking up the kids later in the day. Thus the calendar application and a map search program may also automatically be surfaced on device(s) (e.g., desktop computer, laptop computer, tablet computer) that are available to the programmer. In one embodiment, the applications or content may be displayed on a device based on the workload being experienced by the device (e.g., very active, inactive), the proximity of the device to the programmer (e.g., in his hand, within his grasp), or based on other factors.

[0018] During the call, the programmer's wife may give him the address at which the kids are to be collected and the time. The calendar application may automatically determine that the programmer has no conflicts and the map search program may automatically print out relevant maps. During the call, the programmer's wife may also ask him to pick up some food for dinner. Example apparatus and methods may therefore also bring up locations where the food can be purchased that are on or near the route for picking up the kids. When the call concludes, a to-do list may be presented on the programmer's phone, desktop, laptop, or other computing device(s). When the programmer gets in his car after work, the to-do list may automatically be presented on his car's computing system. Thus, not only will the programmer have a more pleasant, less intrusive phone call that doesn't require him to look up a bunch of information, but the programmer may actually remember what his wife told him and thus actually pick up the food, and the kids, at the appointed time, at the correct location. All of this may be achieved with a more seamless context shift at work and thus with a less painful context shift back to work.

[0019] Figure 1 illustrates an example environment associated with a phone call. A phone 100 provides caller identification information 102 to an example cross-device application 110. Device 110 may be various types of devices including, but not limited to, a phone, a tablet computer, a laptop computer, a smart watch, or a desktop computer. A service 120, which may be located in the cloud, provides action/intention data 122 and a voice-to-text transcript 124 to the cross-device application 110. The cross-device application 110 identifies and surfaces content 112 and application 114, which may be displayed on devices 130 through 138. A

member of the devices 130 through 138 may be selected for presenting the content 112 or application 114 based on the type of content, the type of application, a load on a device, a proximity of the device to a viewer, or on other criteria. In one embodiment, rather than receiving action/intention data 122 and voice-to-text transcript 124 from service 120, the action/intention data 122 or voice-to-text transcript 124 may be provided to devices 130-128 which may then produce content 112 or identify application 114.

**[0020]** Figure 2 illustrates another example environment associated with a phone call. In this example, cross-device application 110 also produces tracking data 140 that may be provided to machine learning 150 which will adapt how service 120 produces the action/intention data 122 in the future. The tracking data 140 may identify content that was accessed during the call, applications that were used during the call, or other information. The machine learning 150 may produce data that controls how a natural language processing (NLP) application or circuit available to service 120 will be adapted. In one embodiment, the tracking data may be produced at devices 130-138. In one embodiment, the machine learning 150 may occur at devices 130-138.

**[0021]** Some portions of the detailed descriptions that follow are presented in terms of algorithms and symbolic representations of operations on data bits within a memory. These algorithmic descriptions and representations are used by those skilled in the art to convey the substance of their work to others. An algorithm is considered to be a sequence of operations that produce a result. The operations may include creating and manipulating physical quantities that may take the form of electronic values. Creating or manipulating a physical quantity in the form of an electronic value produces a concrete, tangible, useful, real-world result.

**[0022]** It has proven convenient at times, principally for reasons of common usage, to refer to these signals as bits, values, elements, symbols, characters, terms, numbers, and other terms. It should be borne in mind, however, that these and similar terms are to be associated with the appropriate physical quantities and are merely convenient labels applied to these quantities. Unless specifically stated otherwise, it is appreciated that throughout the description, terms including processing, computing, and determining, refer to actions and processes of a

computer system, logic, processor, or similar electronic device that manipulates and transforms data represented as physical quantities (e.g., electronic values).

**[0023]** Example methods may be better appreciated with reference to flow diagrams. For simplicity, the illustrated methodologies are shown and described as a series of blocks. However, the methodologies may not be limited by the order of the blocks because, in some embodiments, the blocks may occur in different orders than shown and described. Moreover, fewer than all the illustrated blocks may be required to implement an example methodology. Blocks may be combined or separated into multiple components. Furthermore, additional or alternative methodologies can employ additional, not illustrated blocks.

**[0024]** Figure 3 illustrates an example method 300. Method 300 includes, at 310, receiving an identifier of a caller that initiated the phone call. The identifier may be received from a process (e.g., agent) running on a phone that initiates a phone call. The identifier of the caller may include, for example, a phone number, a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, a social media identifier of the caller, or other information. In one embodiment, the identifier may be provided as part of the phone call. In another embodiment, the identifier may be provided using a separate communication channel (e.g., text, email).

**[0025]** Method 300 includes, at 320, receiving first data that describes an intention associated with the phone call. The first data may be received at times including, before a call session or during a call session. The intention may identify whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication. A social communication may be, for example, a call between friends or family that concerns going to a movie, going to a game, or just catching up. A work communication may be, for example, a call between co-workers, a boss and a worker, or other members of an organization that concerns a business matter. A travel communication may concern planning a trip, reporting on a trip, or other similar activity. A family communication may be, for example, a call between family members that concerns the family (e.g., pick up kids, gift list for birthday party, medical instructions for aging parent). An emergency communication may be, for example, a call from a weather

bureau that a tornado or tsunami is impending. A commercial communication may be, for example, a notification that an item has been purchased, that an item has been delivered, or other similar commercial activity.

**[0026]** Method 300 also includes, at 320, receiving second data that describes an action associated with the phone call. The second data may be received at times including, before a call session or during a call session. The action may describe whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, an edit to a presentation, or other action. A purchase may be, for example, an item to be bought online, an item to be bought at the store, or other item. The purchase may be described by an item, an amount, a time, and other parameters. A payment may be, for example, a rent payment to be made online, a car payment to be made by writing a check, a lunch money payment to be made at school, or other payment. The payment may be described by an item, by an amount, by a time, or by other parameters. An appointment to be made may be, for example, an online meeting to schedule, a physical meeting to schedule, or other type of meeting. The appointment may be described by participants, time, location, and other parameters. An appointment to keep may be, for example, an online meeting to attend, a physical meeting to attend, or other type of meeting to attend. The appointment may be described by participants, time, location, and other parameters. An edit to a document may be, for example, a sentence to add, a word to delete, a comment to make, or other change to the document. The edit may be described by an insertion, a deletion, and a location. An edit to a presentation may be, for example, a graphic to add, text to delete, an animation to include, or other item. The edit may be described by an insertion, a deletion, a change, and a location. The communication to make may be, for example, a phone call, an email, a text, or a social media post. The communication may be described by the desired parties, a desired time, and a desired medium.

**[0027]** Method 300 includes, at 340, presenting third data that describes the caller. The third data may be based, at least in part, on the identifier. Presenting the third data may include displaying the data, making an audible presentation, making a haptic presentation, or other communication of the data. For example, a picture of the caller may be displayed on a computer and the caller's name may be

spoken, scrolled in Braille, or presented in other non-visual ways. The third data may describe not just who the caller is but what the caller has been doing that may be relevant to the phone call. For example, the third data may describe a call participated in by the caller. The description may include a start/end time, a transcript of the call, a summary of the call, photographs or documents reference in the phone call, or other information about the call. By way of illustration, if the caller just finished a call with a co-worker and now is calling you, then the transcript of that previous call may be relevant to this call and may help provide context for this call. The third data may describe an email accessed by the caller. By way of illustration, if the caller just sent you an email and now is calling, then that email may be relevant to the call. The third data may include photographs or documents referenced by or attached to the email. The third data may also describe other communications or actions by the caller including, for example, a text accessed by the caller, a social media item (e.g., Facebook® post, Twitter® tweet, Pinterest® pin) accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller. Information about these communications may be provided as part of identifying not just the caller, but what the caller has been doing recently that may be relevant to the phone call. In one embodiment, the third data may come from the cloud, may come from the caller, or may reside in local data already available to the caller.

**[0028]** Method 300 includes, at 350, selecting a computer application that is relevant to the phone call. The computer application may be selected based, at least in part, on the first data and the second data. For example, if the first data indicates that this is a business call and the second data indicates that it's about editing a document, then a word processing application suitable for editing the document may be started and presented on one or more devices available to a recipient of the phone call. The computer application relevant to the phone call may be, for example, an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, a payment application, or other application. Identifying and automatically starting and presenting a relevant application saves time and reduces the overhead associated with context switching.

**[0029]** Method 300 includes, at 360, selecting a piece of electronic content relevant to the phone call. The piece of electronic content may be selected based, at least in part, on the first data and second data. For example, if the first data indicates that this is a business call and the second data indicates that it's about editing a document, then the document to be edited may be accessed and presented on one or more devices available to a recipient of the phone call. The piece of electronic content relevant to the phone call may be, for example, a document, a presentation, an email, a social media post, a calendar entry, an invoice, a receipt, or other information. By way of illustration, if a caller has just looked at an invoice and a check register and now is calling you, and you are a vendor for the caller, then it is likely that the caller is calling about a payment made or to be made on the invoice. Thus, the invoice and a payment record may be selected as content to be displayed. This may save considerable time looking for information during a phone call.

**[0030]** Method 300 includes, at 370, selectively producing fourth data that describes an action to be performed after the phone call is terminated. Once the fourth data is produced, it may be selectively presented and stored. The fourth data may describe, for example, a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, a presentation to edit, or other item and action. The fourth data may take the form of a to-do list or reminder list. The fourth data may take the form of information that can be provided in a to-do list or reminder list. The fourth data may describe what is to be done (e.g., edit a document), when it is to be done (e.g., before noon tomorrow), by whom it is to be done (e.g., worker name), or other information. Rather than have to hand write a note, the fourth data can be used for electronically reminding someone about a task or even assigning the task to a third party. The fourth data may be directed to a party to the call or to a third party.

**[0031]** The third data, the electronic content, the computer application, or the fourth data may be presented on different devices available to a party to the phone call. The devices may include, for example, a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, a vehicle-based computer of the recipient, or other device. Different devices may be appropriate for different content or different applications at different times. Thus, a member of a set of devices available for presenting the electronic

content or computer application may be selected based on factors including a workload on the member, a proximity of the member to the recipient of the phone call, the type of electronic content, the type of computer application, or other factor. By way of illustration, if a worker is running a desktop computer at 90% CPU utilization but has a tablet computer only running at 10% utilization, then the tablet computer may be selected. By way of further illustration, if a person has a laptop that is co-located with the person and a tablet computer that is a mile away, then the laptop may be selected. By way of further illustration, if the content to be presented is a video clip, then a device with a larger or higher resolution screen may be selected over a device with a smaller or lower resolution screen.

**[0032]** Figure 4 illustrates another embodiment of method 300. This embodiment also includes, at 330, receiving a text-based transcript of the phone call. The text-based transcript may be produced by a natural language processing (NLP) service. The NLP service may operate in the cloud. In one embodiment, the first data may be selected (e.g., parsed) from the text-based transcript. Similarly, the second data may be selected (e.g., parsed) from the text-based transcript. In one embodiment, the text-based transcript may be provided in real-time (e.g., while the parties are conversing).

**[0033]** Method 300 also includes, at 380, producing and storing tracking data. The tracking data may describe the intention associated with the phone call. For example, the tracking data may describe whether the phone call was a personal, business, or other type of call. The tracking data may describe an action associated with the phone call. For example, the tracking data may describe whether the phone call concerned setting up an appointment, setting up a call, making a purchase, or other action. The tracking data may describe an application used during the phone call by the caller or a recipient of the phone call. For example, if the recipient of the phone call opened up a browser application and searched for a location, then the tracking data may record which browser was used and what searches were performed. The tracking data may describe content referenced during the phone call by the caller or the recipient of the phone call. For example, if the caller looked at a video during the call, then a link to the video or other identifying information about the video may be stored in the tracking data. The tracking data may describe a note taken during the phone call by the caller or the recipient of the phone call. For

example, if the recipient used a stylus on their smartphone to make a note, the note may be captured and preserved. In one embodiment, the transcript may be annotated with tracking data that is produced during the phone call. The tracking data may be stored in a data store on the calling phone, in a data store on the phone that was called, on a data store associated with one of the devices available to the caller, in the cloud, or in other data stores.

**[0034]** Method 300 also includes, at 390, presenting the tracking data to a machine learning process. The machine learning process may adapt how the NLP service will select data that describes an intention in the future (e.g., in a subsequent phone call). The machine learning process may also adapt how the NLP service will select data that describes an action for the caller in the future. For example, if the NLP service presented first data that identified the call as a business call, and if the tracking data indicates that business-related documents were edited and that a business-related meeting was scheduled, then the machine learning may enhance or confirm the process that produced the first data. However, if the NLP service presented second data that identified that the action was a meeting to be kept, but the action actually turned out to be a purchase to be made, then the machine learning may diminish or negatively reinforce the process that produced the second data. Various machine learning techniques and approaches may be employed.

**[0035]** While Figures 3 and 4 illustrates various actions occurring in serial, it is to be appreciated that various actions illustrated in Figures 3 and 4 could occur substantially in parallel. By way of illustration, a first process could receive data, a second process could select content and applications, a third process could present content and applications, a fourth process could produce a to-do list, and a fifth process could produce, store, and provide tacking data. While five processes are described, it is to be appreciated that a greater or lesser number of processes could be employed and that lightweight processes, regular processes, threads, and other approaches could be employed.

**[0036]** In one example, a method may be implemented as computer executable instructions. Thus, in one example, a computer-readable storage device may store computer executable instructions that if executed by a machine (e.g., computer) cause the machine to perform methods described or claimed herein including method 300. While executable instructions associated with the above methods are

described as being stored on a computer-readable storage device, it is to be appreciated that executable instructions associated with other example methods described or claimed herein may also be stored on a computer-readable storage device. In different embodiments the example methods described herein may be triggered in different ways. In one embodiment, a method may be triggered manually by a user. In another example, a method may be triggered automatically.

**[0037]** Figure 5 illustrates an apparatus 500 that includes a processor 510, a memory 520, a set 530 of logics, and an interface 540 that connects the processor 510, the memory 520, and the set 530 of logics. The processor 510 may be, for example, a microprocessor in a computer, a specially designed circuit, a field-programmable gate array (FPGA), an application specific integrated circuit (ASIC), a system-on-a-chip, a dual or quad processor, or other computer hardware. The memory 520 may store data associated with a transaction or instructions to be executed by processor 510. Apparatus 500 may be, for example, a computer, a laptop computer, a tablet computer, a personal electronic device, a smart phone, or other device that can access and process data or calls.

**[0038]** In one embodiment, the apparatus 500 may be a general purpose computer that has been transformed into a special purpose computer through the inclusion of the set 530 of logics. The set 530 of logics may be configured to control one or more computing devices to display to a party of a phone call a relevant content and a relevant application for the phone call during the phone call. For example, the set 530 of logics may be circuits or firmware in a computer that surface relevant content on an appropriate device that is visible to or otherwise available to the party to the phone call. By way of illustration, when the party is receiving a phone call from their boss concerning a presentation on which they are working, then the presentation may be displayed on a device having high resolution graphics capability and visible to the recipient. The presentation may be displayed without the parties having to locate it and share it on an application. By way of further illustration, when the party is receiving a phone call from their friend about tickets to a sporting match, then a search engine may display a schematic of a stadium and lists of tickets available from various ticket brokers. The schematic and ticket sites may be presented without the parties having to manually locate the map or the broker sites. If the party is receiving the call in their car, then the information may be

presented on the car computing system. If the party is receiving the call in their living room, then the information may be presented on their television or tablet computer. The parties do not need to select which device will present the content or application.

**[0039]** The set 530 of logics may include a first logic 532 that identifies the party on the phone call. The party may be identified based, at least in part, on data received from a phone used by the party. For example, the party may be identified by a phone number, by an alias, or by other information. In addition to simply identifying the party, the first logic 532 may identify what the party has been doing recently that may be relevant to the phone call. Consider what prompts a person to make a phone call. The person may be looking at something on the internet that reminds them to call their friend. Thus, recent internet (e.g., browsing) activity may be relevant to the call. Similarly, the person may have just finished editing a document at work. Finishing the edits may prompt the user to call a co-worker, boss, or employee. Thus, recent edits may be relevant to the call. In another example, a person may have just received an email that had some important information. The person may pick up the phone in response to the email. Thus, recent emails may be relevant to the call. Other recent activities may also be relevant.

**[0040]** Therefore, in one embodiment, the first logic 532 accesses data that was accessed by the party within a pre-determined time before the phone call or during the phone call. The pre-determined time before the phone call may be measured in clock time (e.g., 1 minute, 5 minutes) or may be measured in activity time (e.g., most recent action, 5 most recent actions). The data accessed by the party may include, for example, email data, text data, word processing data, presentation data, telephonic data, and social media data. The social media data may include, for example, posts made or viewed by the caller, videos made or viewed by the caller, or other social media information.

**[0041]** The set 530 of logics may also include a second logic 534 that identifies the relevant content and the relevant application. The relevant content and relevant application may be identified from text provided in a text-based transcript of the phone call. In one embodiment, the text-based transcript is provided in real time by a natural language processing (NLP) service during the phone call. Thus, during a phone call, a party to the phone call may be presented with a real-time voice-to-text

transcript of the call. Interesting information in the transcript may be parsed to discern what content is relevant to the call and what applications are relevant to the call. For example, if the parties are discussing a presentation, then the computer file in which the presentation is stored is likely relevant content and a presentation viewing application is likely a relevant application. But if the parties are discussing a series of posts on a social media site, then the social media application is likely the relevant application and the thread of posts is likely the relevant content.

**[0042]** Different phone calls may have different purposes. Thus, in one embodiment, the second logic 534 selects the relevant content and the relevant application based, at least in part, on what the phone call concerns. The phone call may concern, for example, a family matter, a business matter, a social matter, or other type of matter. The phone call may also concern, for example, a physical meeting, a communication to be made, a transaction to be performed, an update to be made to the relevant content, or other action. By way of illustration, a family matter phone call may concern two family members agreeing to meet at a certain time (e.g., after work) and a certain location (e.g., favorite restaurant) for a certain purpose (e.g., dinner). This information may be used to bring up a website for the restaurant through which a reservation may be made and even through which dinner may be pre-ordered. The menu would be relevant content and the reservation system would be a relevant application. By way of further illustration, a business matter may concern a boss and worker who agree that the boss will complete the review of a document for the worker by a certain time. The document would be the relevant content and a document processing application (e.g., word processor, slide deck processor) would be a relevant application. By way of further illustration, a social matter phone call may concern two friends agreeing to go to a movie and that one of the friends should text their other friend to tell her when and where to meet. The schedule for the theatre may be relevant content and an email or text application to communicate with the third friend may be a relevant application.

**[0043]** The set 530 of logics may also include a third logic 536 that controls one or more devices to selectively present the relevant content and the relevant application. The third logic 536 may identify what devices are available to present the relevant content and the relevant application and may then selectively distribute the relevant content to appropriate devices. A member of the devices may be

selected to present the relevant content and to present the relevant application based on factors including a workload on the member, a proximity of the member to the recipient of the phone call, the type of relevant content, the type of the relevant application, or on other factors. By way of illustration, the third logic 536 may determine that a desktop system and a tablet computer are available to display relevant content and relevant applications. However, the third logic 536 may determine that the desktop system is operating above a threshold level (e.g., 90% processor usage) and is running a certain type of application (e.g. compiler) that ought not to be disturbed. The third logic 536 may also determine that the tablet computer is used less than a threshold amount (e.g., 25% processor usage) and is running another application (e.g., video game) that can be disturbed. The third logic 536 may therefore decide to present the relevant content and relevant application on the tablet computer rather than the desktop computer. By way of further illustration, the third logic 536 may determine that a party is in their car and that a smart phone, a laptop computer, and the car's computing system are within one meter of the party. The third logic 536 may determine that the car computing system is appropriate for presenting the relevant content and the relevant application rather than displaying them on the laptop computer.

**[0044]** Figure 6 illustrates an apparatus 600 that is similar to apparatus 500 (Figure 5). For example, apparatus 600 includes a processor 610, a memory 620, a set of logics 630 (e.g., 632, 634, 636) that correspond to the set of logics 530 (Figure 5) and an interface 640. However, apparatus 600 includes an additional fourth logic 638. The fourth logic 638 may update an electronic notification system with data that controls the electronic notification system to present an action item to the party on a member of the one or more devices. The action item may concern the physical meeting, the communication to be made, the transaction to be performed, or the update to be made to the relevant content. This data may take the form of a to-do list, a reminder list, or other type of reminder. When the action item is a physical meeting, the to-do list may, for example, include a map annotated with a meeting time and location. When the action item is a communication to be made, the to-do list may, for example, include a link to an application through which the communication can be made and the parties to the communication. Certain fields (e.g., recipient, subject matter) may be pre-populated based on information

processed during the phone call. When the action item is a transaction to be performed, the to-do list may include, for example, a link to a commercial application (e.g., shopping site) at which the transaction can be completed. Certain fields (e.g., object to be purchased) may be pre-populated based on information processed during the phone call. When the action item is an update to be made to a document, the to-do list may include a copy of the document. Different action items may produce different to-do list embodiments.

**[0045]** Figure 7 illustrates an example cloud operating environment 700. A cloud operating environment 700 supports delivering computing, processing, storage, data management, applications, and other functionality as an abstract service rather than as a standalone product. Services may be provided by virtual servers that may be implemented as one or more processes on one or more computing devices. In some embodiments, processes may migrate between servers without disrupting the cloud service. In the cloud, shared resources (e.g., computing, storage) may be provided to computers including servers, clients, and mobile devices over a network. Different networks (e.g., Ethernet, Wi-Fi, 802.x, cellular) may be used to access cloud services. Users interacting with the cloud may not need to know the particulars (e.g., location, name, server, database) of a device that is actually providing the service (e.g., computing, storage). Users may access cloud services via, for example, a web browser, a thin client, a mobile application, or in other ways.

**[0046]** Figure 7 illustrates an example context service 760 residing in the cloud. The context service 760 may rely on a server 702 or service 704 to perform processing and may rely on a data store 706 or database 708 to store data. While a single server 702, a single service 704, a single data store 706, and a single database 708 are illustrated, multiple instances of servers, services, data stores, and databases may reside in the cloud and may, therefore, be used by the context service 760.

**[0047]** Figure 7 illustrates various devices accessing the context service 760 in the cloud. The devices include a computer 710, a tablet 720, a laptop computer 730, a personal digital assistant 740, and a mobile device (e.g., cellular phone, satellite phone) 750. The context service 760 may analyze a call and produce a transcript that is provided to various devices. The context service 760 may also identify action

and intention information. In one embodiment, the action and intention information is extracted (e.g., parsed) from the transcript.

**[0048]** It is possible that different users at different locations using different devices may access the context service 760 through different networks or interfaces. In one example, the context service 760 may be accessed by a mobile device 750. In another example, portions of context service 760 may reside on a mobile device 750.

**[0049]** Figure 8 illustrates an example mobile device 800. While Figure 8 illustrates a mobile device 800, the embodiment is not intended to limit other more general apparatus described in, for example, figures 5 and 6. While a mobile device 800 is illustrated, context setting may also be practiced by devices including computers, tablets, voice over internet protocol devices, and other computing devices.

**[0050]** Figure 8 is a system diagram depicting an exemplary mobile device 800 that includes a variety of optional hardware and software components, shown generally at 802. Components 802 in the mobile device 800 can communicate with other components, although not all connections are shown for ease of illustration. The mobile device 800 can be a variety of computing devices (e.g., cell phone, smartphone, handheld computer, Personal Digital Assistant (PDA), etc.) and can allow wireless two-way communications with one or more mobile communications networks 804, such as a cellular or satellite networks.

**[0051]** Mobile device 800 can include a controller or processor 810 (e.g., signal processor, microprocessor, ASIC, or other control and processing logic circuitry) for performing tasks including signal coding, data processing, input/output processing, power control, or other functions. An operating system 812 can control the allocation and usage of the components 802 and support application programs 814. The application programs 814 can include mobile computing applications (e.g., email applications, calendars, contact managers, web browsers, messaging applications), or other computing applications.

**[0052]** Mobile device 800 can include memory 820. Memory 820 can include non-removable memory 822 or removable memory 824. The non-removable memory 822 can include RAM, ROM, flash memory, a hard disk, or other memory

storage technologies. The removable memory 824 can include flash memory or a Subscriber Identity Module (SIM) card, which is well known in GSM communication systems, or other memory storage technologies, such as "smart cards." The memory 820 can be used for storing data or code for running the operating system 812 and the applications 814. Example data can include web pages, text, images, sound files, video data, or other data sets to be sent to or received from one or more network servers or other devices via one or more wired or wireless networks. The memory 820 can be used to store a subscriber identifier, such as an International Mobile Subscriber Identity (IMSI), and an equipment identifier, such as an International Mobile Equipment Identifier (IMEI). Such identifiers can be transmitted to a network server to identify users and equipment.

**[0053]** The mobile device 800 can support one or more input devices 830 including, but not limited to, a touchscreen 832, a microphone 834, a camera 836, a physical keyboard 838, or trackball 840. The mobile device 800 may also support output devices 850 including, but not limited to, a speaker 852 and a display 854. Other possible output devices (not shown) can include piezoelectric or other haptic output devices. Some devices can serve more than one input/output function. For example, touchscreen 832 and display 854 can be combined in a single input/output device. The input devices 830 can include a Natural User Interface (NUI). An NUI is an interface technology that enables a user to interact with a device in a "natural" manner, free from artificial constraints imposed by input devices such as mice, keyboards, remote controls, and others. Examples of NUI methods include those relying on speech recognition, touch and stylus recognition, gesture recognition both on screen and adjacent to the screen, air gestures, head and eye tracking, voice and speech, vision, touch, gestures, and machine intelligence. Other examples of a NUI include motion gesture detection using accelerometers/gyroscopes, facial recognition, 3D displays, head, eye, and gaze tracking, immersive augmented reality and virtual reality systems, all of which provide a more natural interface, as well as technologies for sensing brain activity using electric field sensing electrodes (EEG and related methods). Thus, in one specific example, the operating system 812 or applications 814 can comprise speech-recognition software as part of a voice user interface that allows a user to operate the device 800 via voice commands. Further, the device 800 can include input devices and software that allow for user interaction

via a user's spatial gestures, such as detecting and interpreting gestures to provide input to a gaming application.

**[0054]** A wireless modem 860 can be coupled to an antenna 891. In some examples, RF filters are used and the processor 810 need not select an antenna configuration for a selected frequency band. The wireless modem 860 can support two-way communications between the processor 810 and external devices. The modem 860 is shown generically and can include a cellular modem for communicating with the mobile communication network 804 and/or other radio-based modems (e.g., Bluetooth 864 or Wi-Fi 862). The wireless modem 860 may be configured for communication with one or more cellular networks, such as a GSM network for data and voice communications within a single cellular network, between cellular networks, or between the mobile device and a public switched telephone network (PSTN).

**[0055]** The mobile device 800 may include at least one input/output port 880, a power supply 882, a satellite navigation system receiver 884, such as a Global Positioning System (GPS) receiver, an accelerometer 886, or a physical connector 890, which can be a USB port, IEEE 1394 (FireWire) port, RS-232 port, or other port. The illustrated components 802 are not required or all-inclusive, as other components can be deleted or added.

**[0056]** Mobile device 800 may include a context logic 899 that is configured to provide a functionality for the mobile device 800. For example, context logic 899 may provide a client for interacting with a service (e.g., service 760, figure 7). Context logic 899 may provide or receive caller identification information. Context logic 899 may provide or receive action and intention information that facilitates establishing a context for a call. Context logic 899 may use the action and intention information to identify content or applications to access and provide on mobile device 800 or on other devices that are available to a party to a call. Context logic 899 may provide a to-do list that is surfaced on device 800 or other devices that are available to a party to a call.

Aspects of Certain Embodiments

**[0057]** In one embodiment, a computerized method includes receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call. The computerized method includes receiving first data that describes an intention associated with the phone call and receiving second data that describes an action associated with the phone call. The computerized method includes presenting third data that describes the caller, where the third data is based, at least in part, on the identifier. The computerized method includes selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data and presenting the computer application on one or more devices available to a recipient of the phone call. The computerized method includes selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data and presenting the electronic content to the recipient using one or more members of the one or more devices. The computerized method includes selectively producing fourth data that describes an action to be performed after the phone call is terminated, selectively presenting the fourth data; and selectively storing the fourth data.

**[0058]** In one embodiment, the computerized method includes producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call by the caller or a recipient of the phone call, a content referenced during the phone call by the caller or the recipient of the phone call, a search performed during the phone call by the caller or the recipient of the phone call, or a note taken during the phone call by the caller or the recipient of the phone call.

**[0059]** In one embodiment, the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, or a social media identifier of the caller.

**[0060]** In one embodiment, the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication.

**[0061]** In one embodiment, the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation.

**[0062]** In one embodiment, the communication to make is a phone call, an email, a text, or a social media post.

**[0063]** In one embodiment, the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller.

**[0064]** In one embodiment, the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application.

**[0065]** In one embodiment, the piece of content relevant to the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt.

**[0066]** In one embodiment, the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit.

**[0067]** In one embodiment, the computerized method includes receiving a text-based transcript of the phone call, where the text-based transcript is produced by a natural language processing (NLP) service operating in the cloud, and where the first data is selected from the text-based transcript and where the second data is selected from the text-based transcript.

**[0068]** In one embodiment, the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

**[0069]** In one embodiment, a member of the one or more devices is selected to present the electronic content or to run the computer application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of

the phone call, on the type of electronic content, or on the type of computer application.

**[0070]** In one embodiment, the computerized method includes presenting the tracking data to a machine learning process that adapts how a natural language processing (NLP) service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call.

**[0071]** In one embodiment, an apparatus includes a processor, a memory, a set of logics configured to control one or more computing devices to display to a party of a phone call a relevant content and a relevant application for the phone call during the phone call, and an interface to connect the processor, the memory, and the set of logics. In one embodiment, the set of logics includes a first logic that identifies the party on the phone call based, at least in part, on data received from a phone used by the party, a second logic that identifies the relevant content and the relevant application based, at least in part, on text provided in a text-based transcript of the phone call, where the text-based transcript is provided in real time by a natural language processing (NLP) service during the phone call, and a third logic that controls the one or more devices to selectively present the relevant content and the relevant application.

**[0072]** In one embodiment, the first logic is configured to access data that was accessed by the party within a pre-determined time before the phone call or during the phone call, where the data accessed by the party includes email data, text data, word processing data, presentation data, telephonic data, and social media data.

**[0073]** In one embodiment, the second logic is configured to select the relevant content and the relevant application based, at least in part, on whether the phone call concerns a family matter, a business matter, or a social matter and on whether the phone call concerns a physical meeting, a communication to be made, a transaction to be performed, or an update to be made to the relevant content.

**[0074]** In one embodiment, the third logic is configured to identify the one or more devices available to present the relevant content and the relevant application, and to selectively distribute the relevant content to the one or more devices, where a member of the one or more devices is selected to present the relevant content and to present the relevant application based, at least in part, on a workload on the

member, on a proximity of the member to the recipient of the phone call, on the type of relevant content, or on the type of the relevant application.

[0075] In one embodiment, the apparatus includes a fourth logic that updates an electronic notification system with data that controls the electronic notification system to present an action item to the party on a member of the one or more devices, where the action item concerns the physical meeting, the communication to be made, the transaction to be performed, or the update to be made to the relevant content.

Definitions

[0076] The following includes definitions of selected terms employed herein. The definitions include various examples or forms of components that fall within the scope of a term and that may be used for implementation. The examples are not intended to be limiting. Both singular and plural forms of terms may be within the definitions.

[0077] "Computer-readable storage device", as used herein, refers to a device that stores instructions or data. "Computer-readable storage device" does not refer to propagated signals. A computer-readable storage device may take forms, including, but not limited to, non-volatile media, and volatile media. Non-volatile media may include, for example, optical disks, magnetic disks, tapes, and other media. Volatile media may include, for example, semiconductor memories, dynamic memory, and other media. Common forms of a computer-readable storage devices may include, but are not limited to, a floppy disk, a flexible disk, a hard disk, a magnetic tape, other magnetic medium, an application specific integrated circuit (ASIC), a compact disk (CD), a random access memory (RAM), a read only memory (ROM), a memory chip or card, a memory stick, and other media from which a computer, a processor or other electronic device can read.

[0078] References to "one embodiment", "an embodiment", "one example", and "an example" indicate that the embodiment(s) or example(s) so described may include a particular feature, structure, characteristic, property, element, or limitation, but that not every embodiment or example necessarily includes that particular feature, structure, characteristic, property, element or limitation. Furthermore,

repeated use of the phrase "in one embodiment" does not necessarily refer to the same embodiment, though it may.

**[0079]** "Data store", as used herein, refers to a physical or logical entity that can store data. A data store may be, for example, a database, a table, a file, a list, a queue, a heap, a memory, a register, and other physical repository. In different examples, a data store may reside in one logical or physical entity or may be distributed between two or more logical or physical entities.

**[0080]** "Logic", as used herein, includes but is not limited to hardware or firmware on a machine, or combinations of each to perform a function(s) or an action(s), or to cause a function or action from another logic, method, or system. Logic may include a software controlled microprocessor, a discrete logic (e.g., ASIC), an analog circuit, a digital circuit, a programmed logic device, a memory device containing instructions, and other physical devices. Logic may include one or more gates, combinations of gates, or other circuit components. Where multiple logical logics are described, it may be possible to incorporate the multiple logical logics into one physical logic. Similarly, where a single logical logic is described, it may be possible to distribute that single logical logic between multiple physical logics.

**[0081]** To the extent that the term "includes" or "including" is employed in the detailed description or the claims, it is intended to be inclusive in a manner similar to the term "comprising" as that term is interpreted when employed as a transitional word in a claim.

**[0082]** To the extent that the term "or" is employed in the detailed description or claims (e.g., A or B) it is intended to mean "A or B or both". When the Applicant intends to indicate "only A or B but not both" then the term "only A or B but not both" will be employed. Thus, use of the term "or" herein is the inclusive, and not the exclusive use. See, Bryan A. Garner, A Dictionary of Modern Legal Usage 624 (2d. Ed. 1995).

**[0083]** Although the subject matter has been described in language specific to structural features or methodological acts, it is to be understood that the subject matter defined in the appended claims is not necessarily limited to the specific features or acts described above. Rather, the specific features and acts described above are disclosed as example forms of implementing the claims.

Claims

What is claimed is:

1. A computerized method, comprising:

receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call;

receiving first data that describes an intention associated with the phone call;

receiving second data that describes an action associated with the phone call;

presenting third data that describes the caller, where the third data is based, at least in part, on the identifier;

selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data;

presenting the computer application on one or more devices available to a recipient of the phone call;

selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data;

presenting the electronic content to the recipient using one or more members of the one or more devices;

selectively producing fourth data that describes an action to be performed after the phone call is terminated;

selectively presenting the fourth data; and

selectively storing the fourth data.

2. The computerized method of claim 1, comprising:

producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call by the caller or a recipient of the phone call, a content referenced during the phone call by the caller or the recipient of the phone call, a search performed during the phone call by the caller or the recipient of the phone call, or a note taken during the phone call by the caller or the recipient of the phone call.

3. The computerized method of claim 1, where the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, or a social media identifier of the caller.

4. The computerized method of claim 1, where the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication.

5. The computerized method of claim 1, where the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation.

6. The computerized method of claim 5, where the communication to make is a phone call, an email, a text, or a social media post.

7. The computerized method of claim 1, where the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller.

8. The computerized method of claim 1, where the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application.

9. The computerized method of claim 1, where the piece of content relevant to the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt.

10. The computerized method of claim 1, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit.

11. The computerized method of claim 1, comprising receiving a text-based transcript of the phone call, where the text-based transcript is produced by a natural language processing (NLP) service operating in the cloud, and where the first data is selected from the text-based transcript and where the second data is selected from the text-based transcript.

12. The computerized method of claim 1, where the one or more devices include a phone of the recipient, a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient.

13. The computerized method of claim 12, where a member of the one or more devices is selected to present the electronic content or to run the computer application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application.

14. The computerized method of claim 2, comprising presenting the tracking data to a machine learning process that adapts how a natural language processing (NLP) service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call.

15. A computer-readable storage device storing computer-executable instructions that when executed by a computer control the computer to perform a method, the method comprising:

receiving, from a process running on a phone that initiates a phone call, an identifier of a caller that initiated the phone call, where the identifier of the caller includes a device identifier of the phone that initiates the phone call, a location of the phone that initiates the phone call, an email address of the caller, and a social media identifier of the caller;

receiving a text-based transcript of the phone call, where the text-based transcript is produced by a natural language processing (NLP) service operating in the cloud;

receiving first data that describes an intention associated with the phone call, where the first data describes whether the phone call is a social communication, a work communication, a travel communication, an informational communication, a family communication, an emergency communication, or a commercial communication, where the first data is selected from the text-based transcript;

receiving second data that describes an action associated with the phone call, where the second data describes whether the phone call concerns a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, an edit to a document, or an edit to a presentation, where the second data is selected from the text-based transcript;

presenting third data that describes the caller, where the third data is based, at least in part, on the identifier, where the third data describes a call participated in by the caller, an email accessed by the caller, a text accessed by the caller, a social media item accessed by the caller, a search performed by the caller, a document accessed by the caller, or a presentation accessed by the caller;

selecting a computer application that is relevant to the phone call based, at least in part, on the first data and the second data, where the computer application relevant to the phone call is an email application, a word processing application, a presentation processing application, a search application, a social media application, a calendar application, or a payment application;

presenting the computer application on one or more devices available to a recipient of the phone call, where the one or more devices include a tablet computer of the recipient, a laptop computer of the recipient, a desktop computer of the recipient, or a vehicle-based computer of the recipient, where a member of the one or more devices is selected to present the electronic content or to run the computer application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of electronic content, or on the type of computer application;

selecting a piece of electronic content relevant to the phone call based, at least in part, on the first data and second data, where the piece of content relevant to

the phone call is a document, a presentation, an email, a social media post, a calendar entry, an invoice, or a receipt;

presenting the electronic content to the recipient using one or more members of the one or more devices;

selectively producing fourth data that describes an action to be performed after the phone call is terminated, where the fourth data describes a purchase, a payment, an appointment to be made, an appointment to keep, a communication to make, a document to edit, or a presentation to edit, where the communication to make is a phone call, an email, a text, or a social media post;

selectively presenting the fourth data;

selectively storing the fourth data;

producing and storing tracking data that describes the intention associated with the phone call, the action associated with the phone call, an application used during the phone call, a content referenced during the phone call, a search performed during the phone call, or a note taken during the phone call, and

presenting the tracking data to a machine learning process that adapts how the NLP service will select data that describes an intention and will select data that describes an action for the caller in a subsequent phone call.

16. An apparatus, comprising:

a processor;

a memory;

a set of logics configured to control one or more computing devices to display to a party of a phone call a relevant content and a relevant application for the phone call during the phone call; and

an interface to connect the processor, the memory, and the set of logics;

the set of logics comprising:

a first logic that identifies the party on the phone call based, at least in part, on data received from a phone used by the party;

a second logic that identifies the relevant content and the relevant application based, at least in part, on text provided in a text-based transcript of the phone call, where the text-based transcript is provided in real time by a natural language processing (NLP) service during the phone call, and

a third logic that controls the one or more devices to selectively present the relevant content and the relevant application.

17. The apparatus of claim 16, the first logic being configured to access data that was accessed by the party within a pre-determined time before the phone call or during the phone call, where the data accessed by the party includes email data, text data, word processing data, presentation data, telephonic data, and social media data.

18. The apparatus of claim 17, the second logic being configured to select the relevant content and the relevant application based, at least in part, on whether the phone call concerns a family matter, a business matter, or a social matter and on whether the phone call concerns a physical meeting, a communication to be made, a transaction to be performed, or an update to be made to the relevant content.

19. The apparatus of claim 18, the third logic being configured to identify the one or more devices available to present the relevant content and the relevant application, and to selectively distribute the relevant content to the one or more devices, where a member of the one or more devices is selected to present the relevant content and to present the relevant application based, at least in part, on a workload on the member, on a proximity of the member to the recipient of the phone call, on the type of relevant content, or on the type of the relevant application.

20. The apparatus of claim 19, comprising a fourth logic that updates an electronic notification system with data that controls the electronic notification system to present an action item to the party on a member of the one or more devices, where the action item concerns the physical meeting, the communication to be made, the transaction to be performed, or the update to be made to the relevant content.

## ABSTRACT

Example apparatus and methods concern establishing context for a phone call. A computing device is controlled to display content and applications that are relevant for the call during the call. A party on the call is identified using data received from a phone used by the party. The relevant content and the relevant application are identified using actions (e.g., purchase to make, call to make) and intentions (e.g., family matter, business matter) identified in text provided in a text-based transcript of the call. The text-based transcript is provided in real time by a natural language processing (NLP) service during the call. The devices are controlled to selectively present the relevant content and the relevant application to make the call more automated and more productive. A to-do list is automatically generated based on the intentions, the actions, and on subject matter or content discussed or accessed during the call.




Patent Owner Ex. 2102
Page 288 of 304

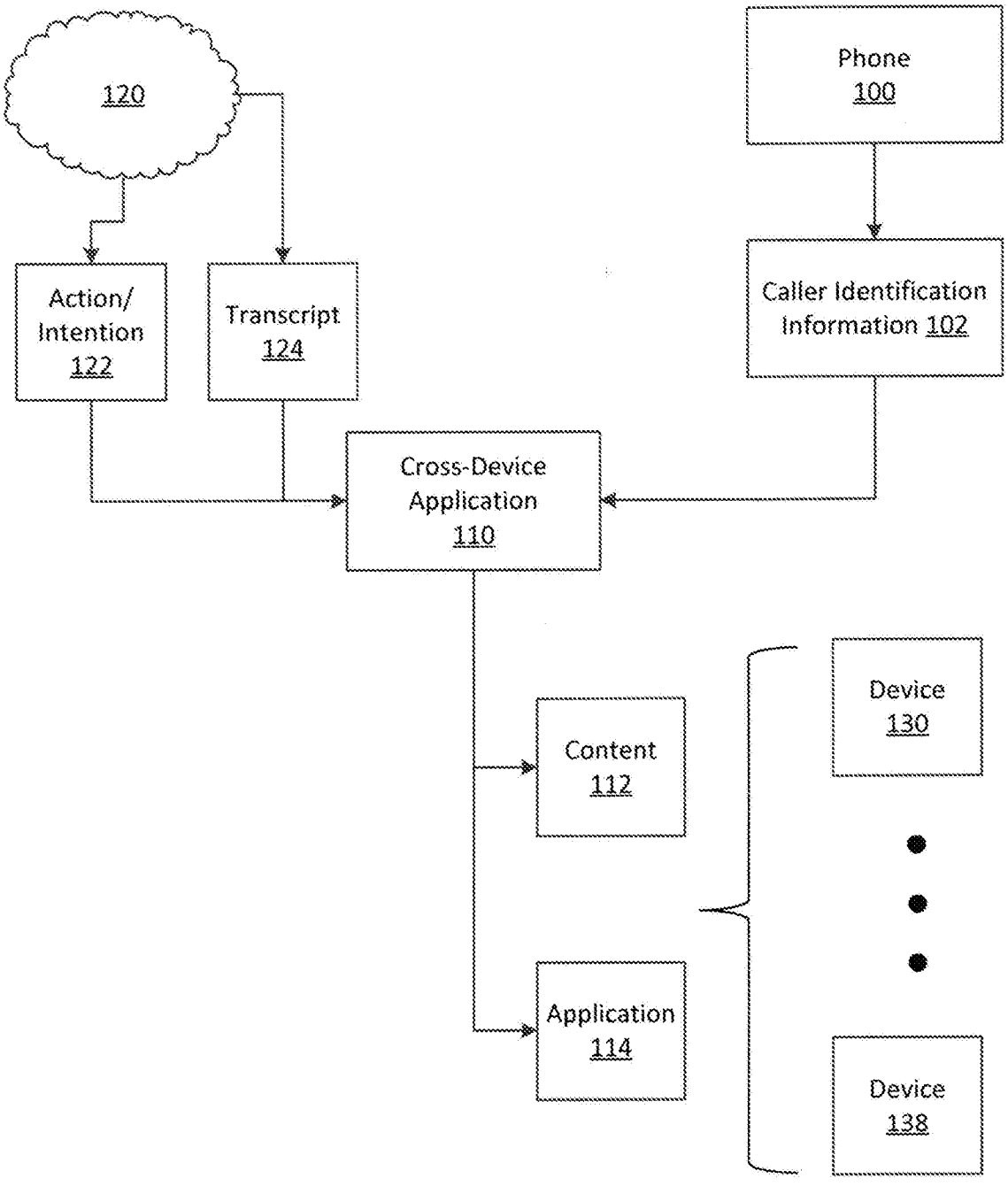

120
Phone
100
Action/
Intention
122
Transcript
124
Caller Identification
Information 102
Cross-Device
Application
110
Content
112
Device
130
Application
114
Device
138

FIG. 1

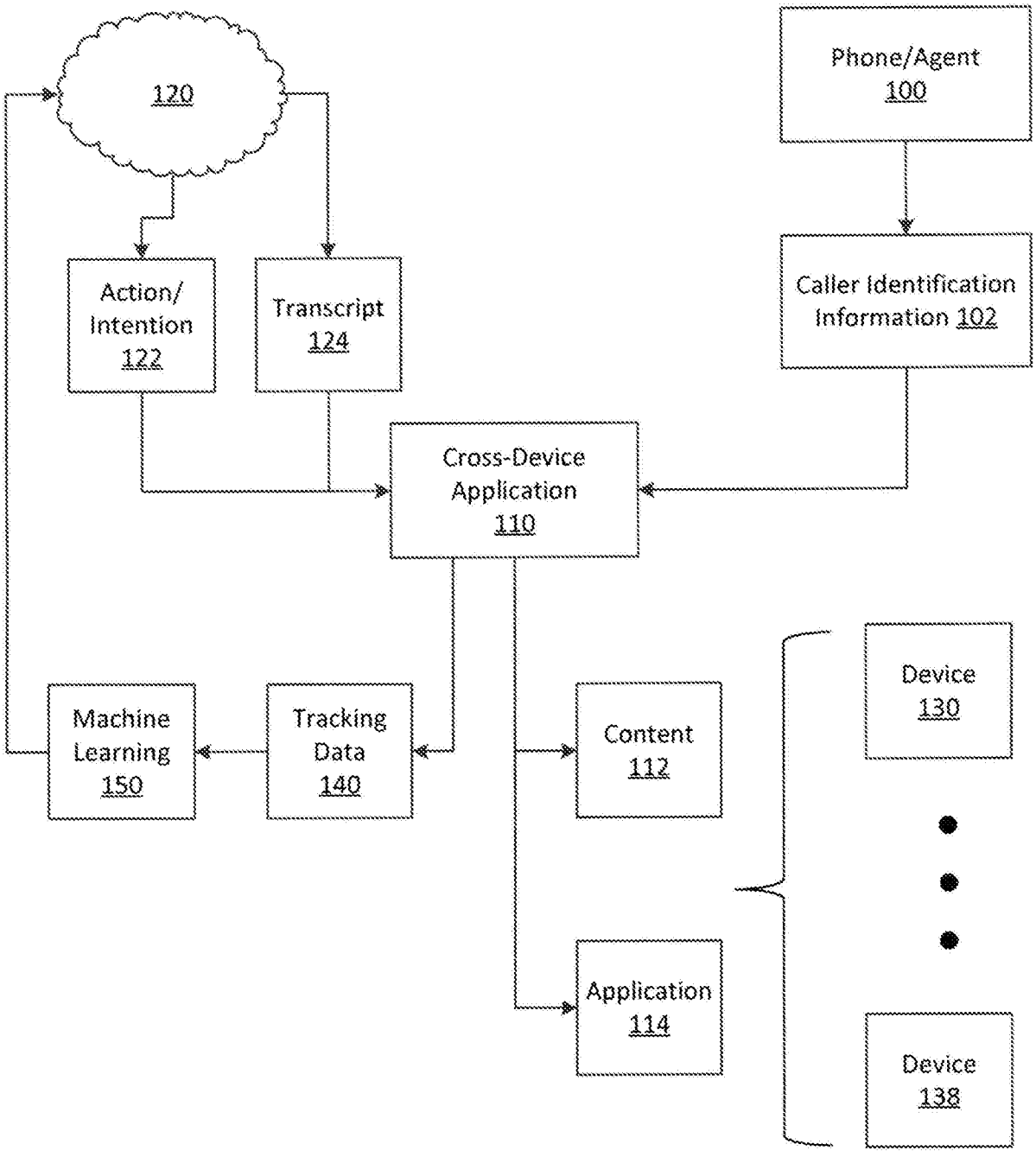

120
Phone/Agent
100
Action/
Intention
122
Transcript
124
Caller Identification
Information 102
Cross-Device
Application
110
Machine
Learning
150
Tracking
Data
140
Content
112
Device
130
Application
114
Device
138

FIG. 2

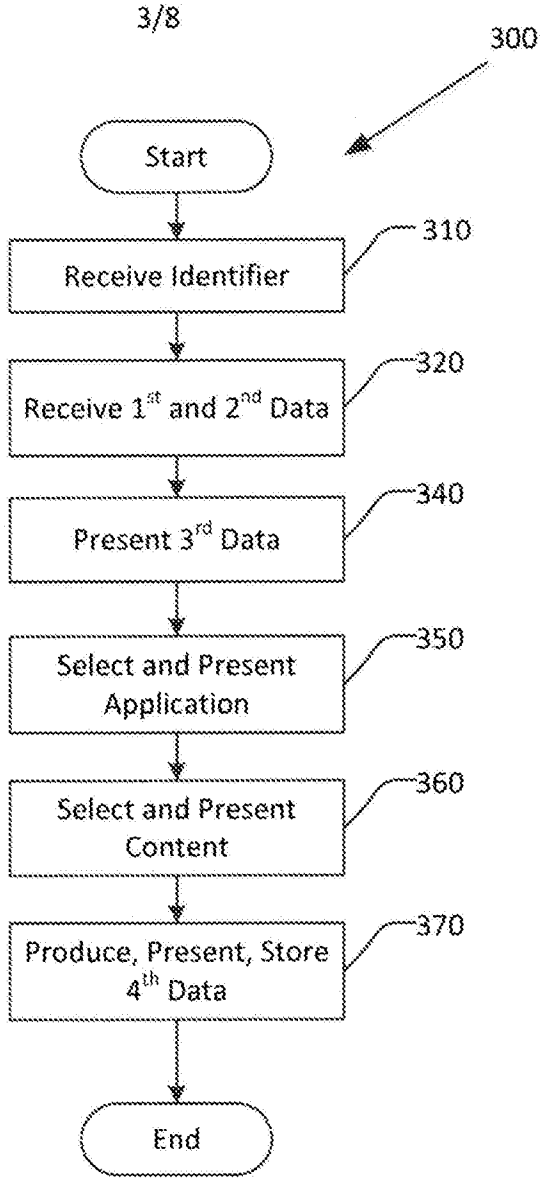

300
Start
Receive Identifier
310
Receive 1st and 2nd Data
320
Present 3rd Data
340
Select and Present Application
350
Select and Present Content
360
Produce, Present, Store 4th Data
370
End

FIG. 3

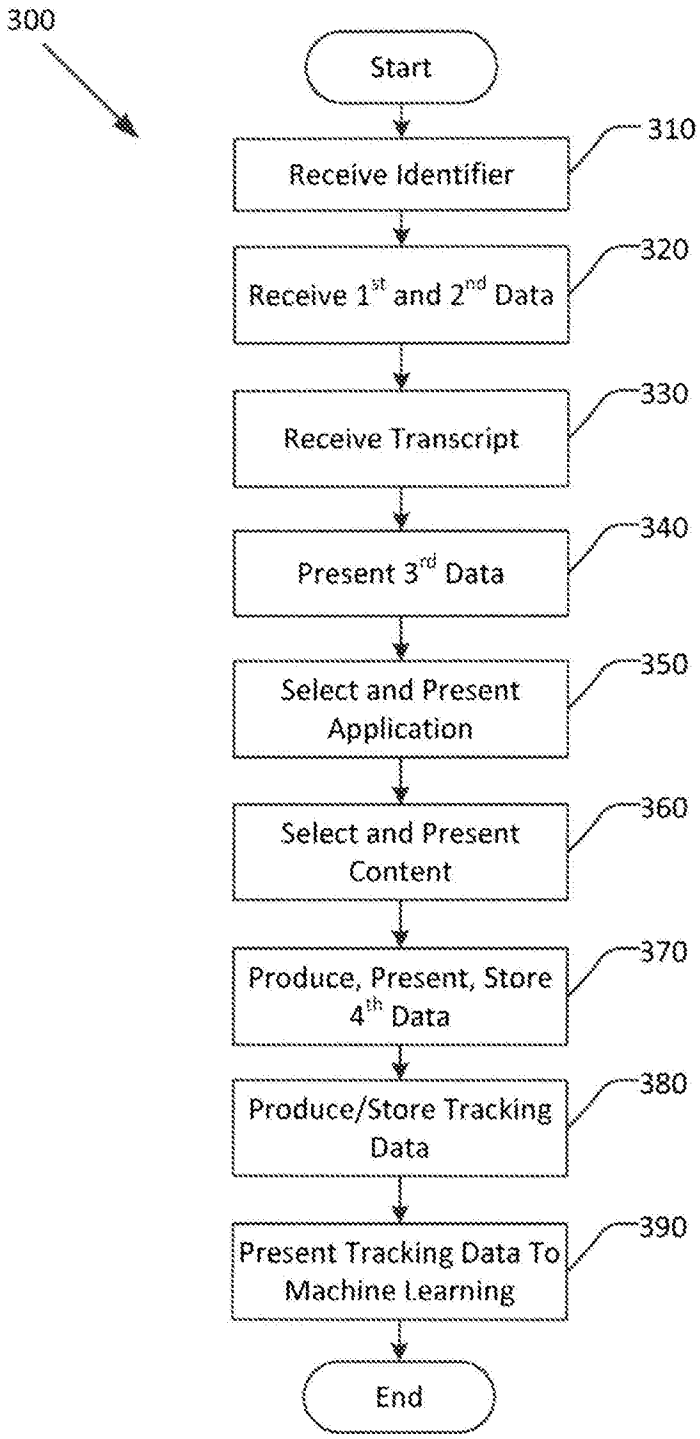

300
Start
Receive Identifier
310
Receive 1st and 2nd Data
320
Receive Transcript
330
Present 3rd Data
340
Select and Present Application
350
Select and Present Content
360
Produce, Present, Store 4th Data
370
Produce/Store Tracking Data
380
Present Tracking Data To Machine Learning
390
End

FIG. 4

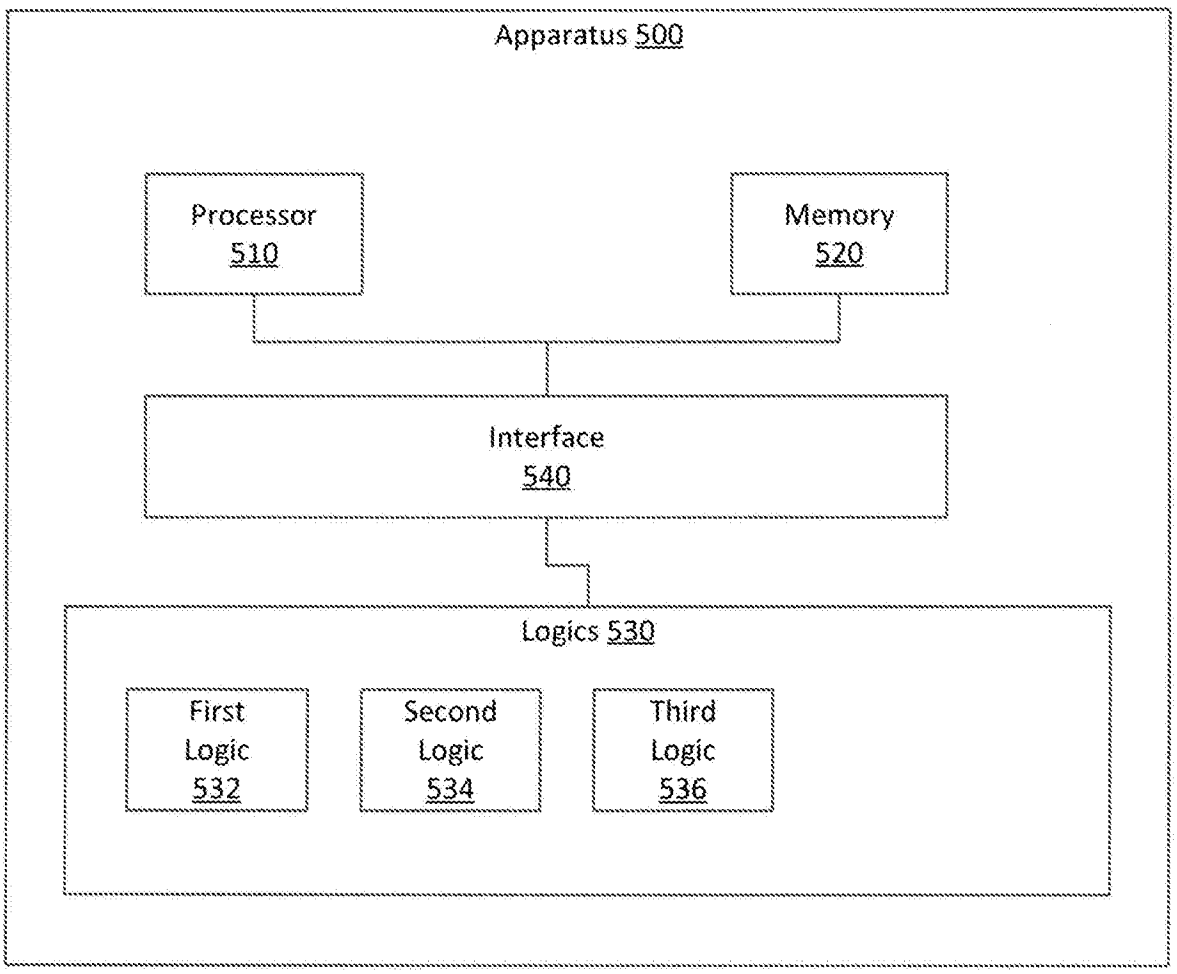

Apparatus 500
Processor 510
Memory 520
Interface 540
Logics 530
First Logic 532
Second Logic 534
Third Logic 536

FIG. 5

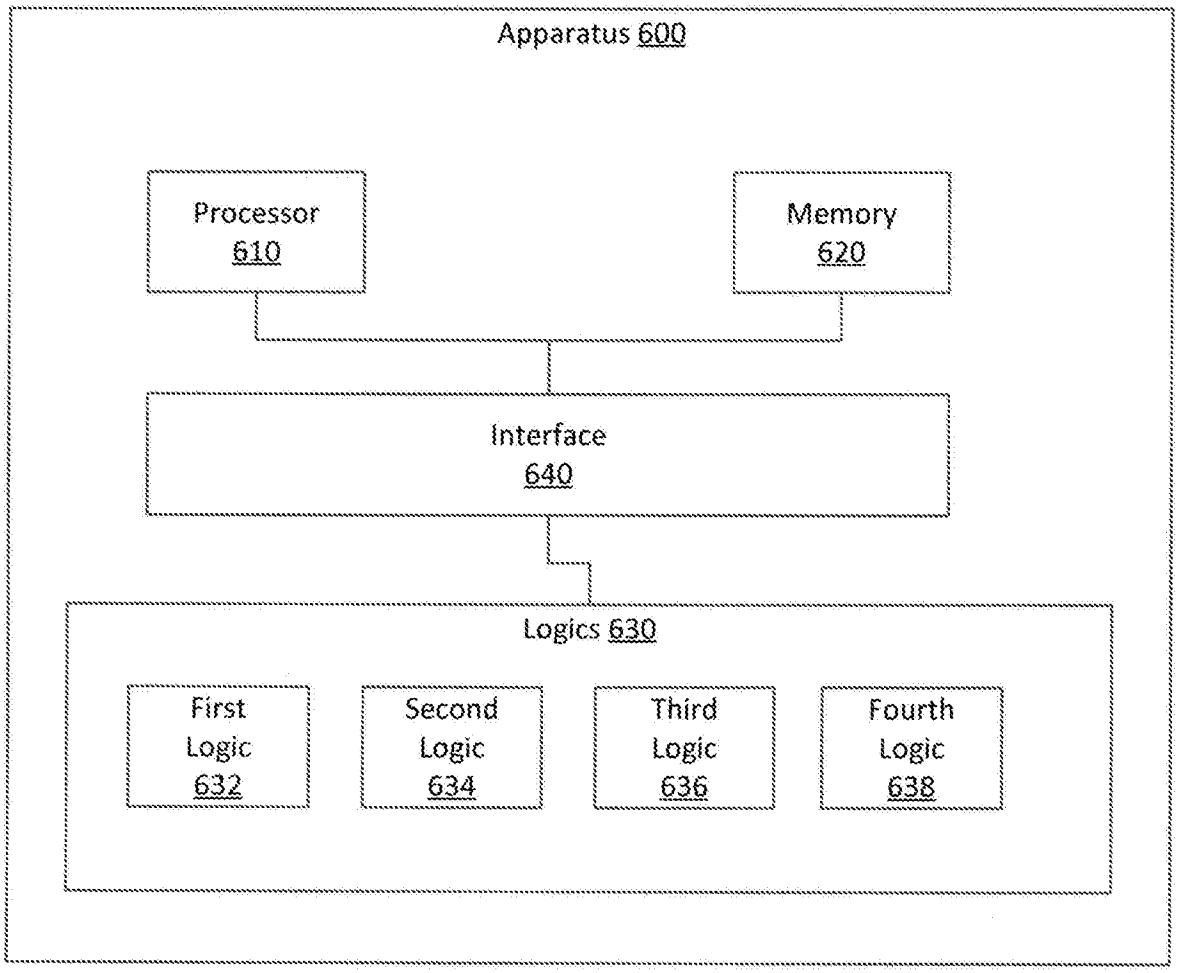

Apparatus 600
Processor 610
Memory 620
Interface 640
Logics 630
First Logic 632
Second Logic 634
Third Logic 636
Fourth Logic 638

FIG. 6

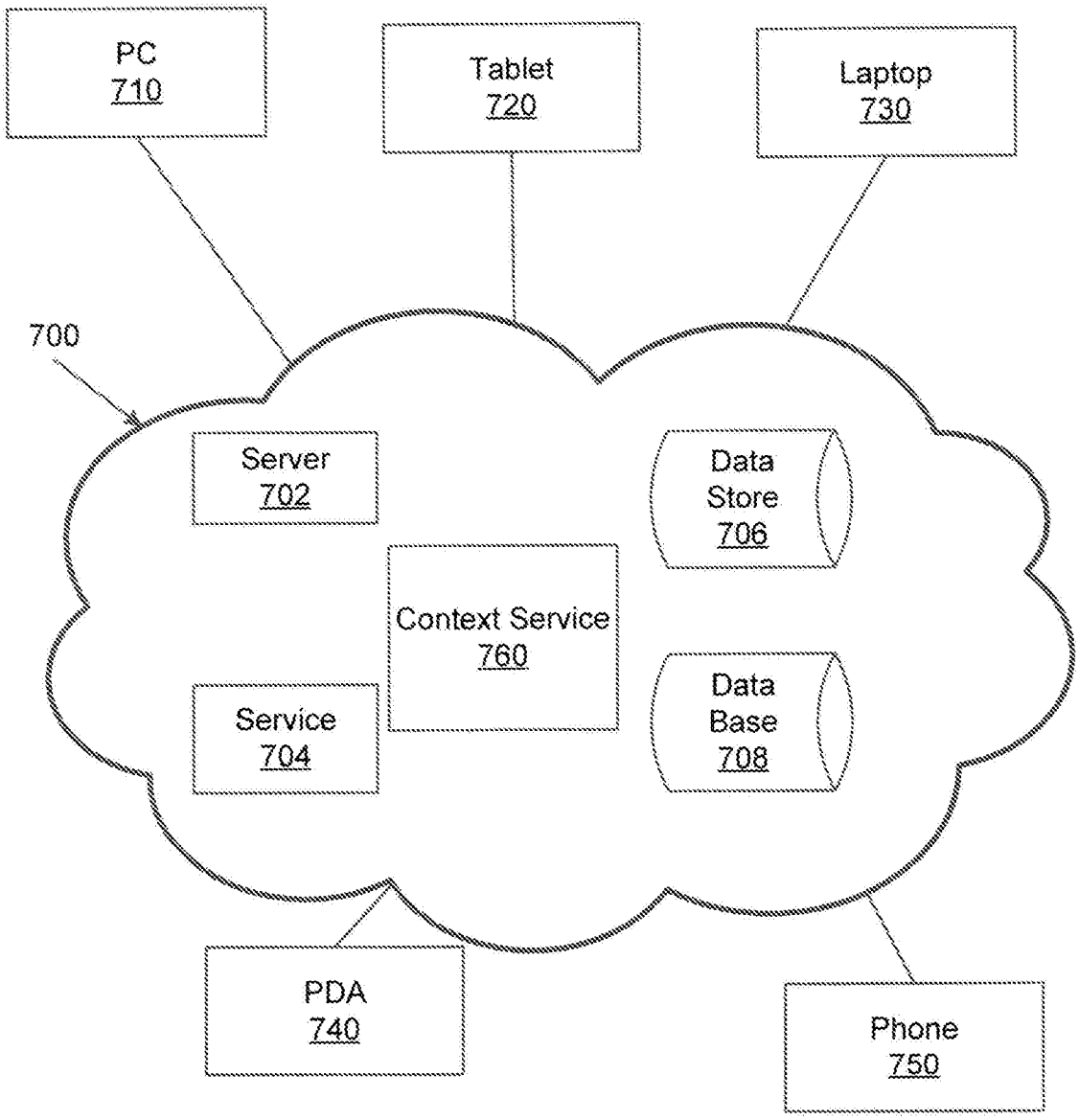

PC
710
Tablet
720
Laptop
730
700
Server
702
Data
Store
706
Context Service
760
Service
704
Data
Base
708
PDA
740
Phone
750

FIG. 7

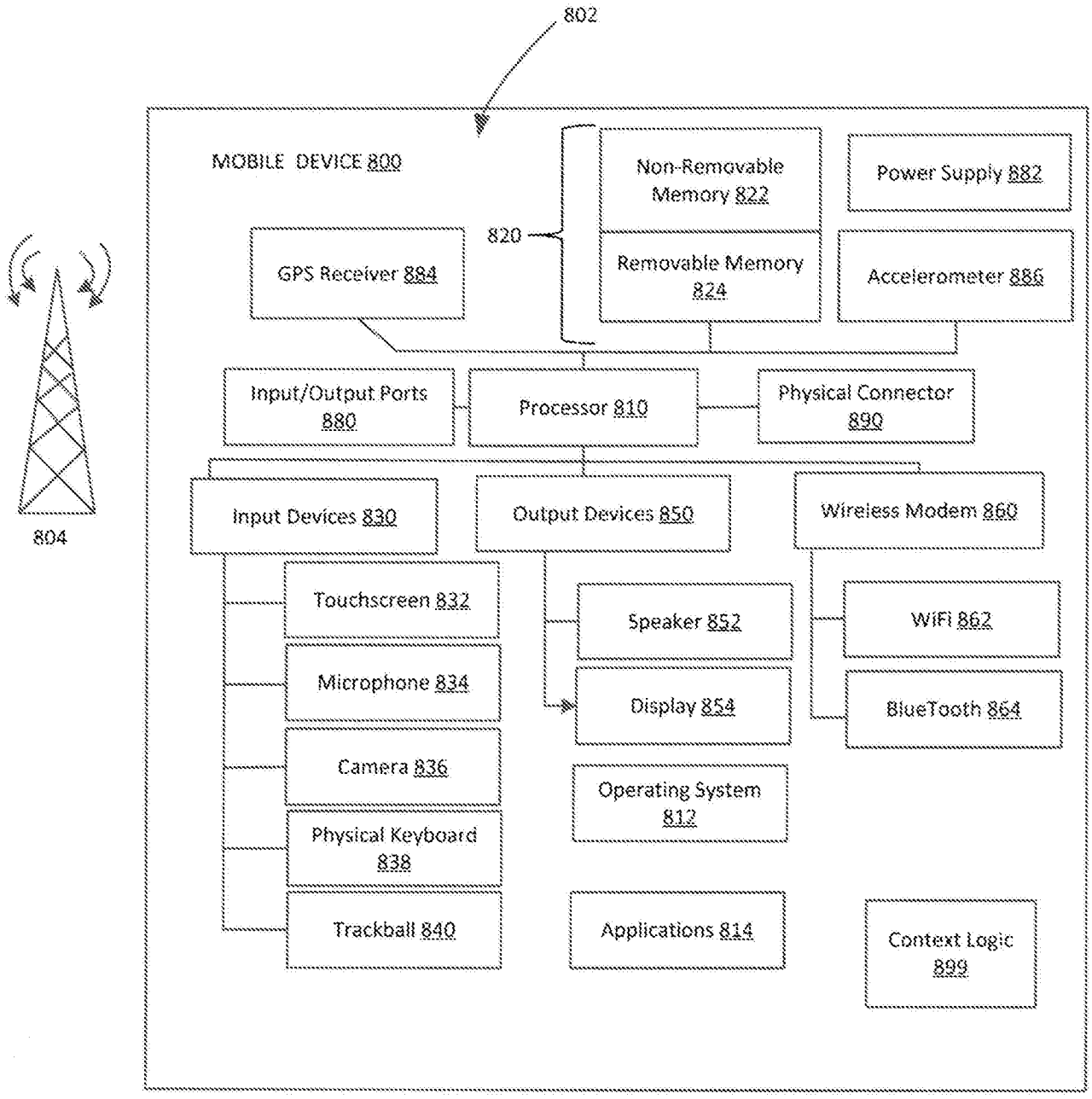

802
MOBILE DEVICE 800
820
Non-Removable Memory 822
Removable Memory 824
Power Supply 882
Accelerometer 886
GPS Receiver 884
Input/Output Ports 880
Processor 810
Physical Connector 890
Input Devices 830
Output Devices 850
Wireless Modem 860
Touchscreen 832
Microphone 834
Camera 836
Physical Keyboard 838
Trackball 840
Speaker 852
Display 854
WiFi 862
BlueTooth 864
Operating System 812
Applications 814
Context Logic 899
804

FIG. 8

PTO/AIA/01 (06-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____
  filed on _____

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Gautam Deora Date (Optional): 12/29/2015

Signature: Gautam Deora

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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/AIA/01 (08-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |
|---|---|

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____
  filed on _____.

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Vikas Verma Date (Optional): 29 DEC 2015

Signature: Vikas

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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/01 (08-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |
|---|---|

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____
  filed on _____

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Saumya Chandra Date (Optional): 20 Dec 2015

Signature: Saumya Chandra

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/SB/01 form for each additional inventor.

This collection of information is required by 37 CFR 1.63 and 37 CFR 1.64. 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.

PTO/AIA/01 (06-12)
Approved for use through 01/31/2014. OMB 0651-0032
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

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |
|---|---|

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [x] The attached application, or
- [ ] United States application or PCT international application number _____

filed on _____.

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Manoj Lalavat Date (Optional): 5/8/2016

Signature: _____

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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/AIA/01 (06-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____
  filed on _____

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Sonia Singh Date (Optional): 12/29/2015

Signature: Sonia Singh

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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/AIA/01 (06-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____
  filed on _____.

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Badhri Ravikumar Date (Optional): 12/29/2015

Signature: _____

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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 5.*

PTO/AIA/01 (06-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____

  filed on _____.

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Anushree Bansal  Date (Optional): 30|12|2015

Signature: _____

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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/AIA/01 (08-12)
Approved for use through 01/31/2014. OMB 0651-0032
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.

# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| Title of Invention | Cross Device Companion Application For Phone<br>MS# 358721.01 |

As the below named inventor, I hereby declare that:

This declaration is directed to:

- [■] The attached application, or
- [ ] United States application or PCT international application number _____

filed on _____.

The above-identified application was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

## WARNING:

Petitioner/applicant is cautioned to avoid submitting personal information in documents filed in a patent application that may contribute to identity theft. Personal information such as social security numbers, bank account numbers, or credit card numbers (other than a check or credit card authorization form PTO-2038 submitted for payment purposes) is never required by the USPTO to support a petition or an application. If this type of personal information is included in documents submitted to the USPTO, petitioners/applicants should consider redacting such personal information from the documents before submitting them to the USPTO. Petitioner/applicant is advised that the record of a patent application is available to the public after publication of the application (unless a non-publication request in compliance with 37 CFR 1.213(a) is made in the application) or issuance of a patent. Furthermore, the record from an abandoned application may also be available to the public if the application is referenced in a published application or an issued patent (see 37 CFR 1.14). Checks and credit card authorization forms PTO-2038 submitted for payment purposes are not retained in the application file and therefore are not publicly available.

LEGAL NAME OF INVENTOR

Inventor: Snehita Peddi Date (Optional): 12/29/2015

Signature: Snehita

Note: An application data sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form or must have been previously filed. Use an additional PTO/AIA/01 form for each additional inventor.

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 1 minute 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.*