Doc Code: PA..

Document Description: Power of Attorney

PTO/AIA/82A (07-12)

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# 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 | September 8, 2015 |
| First Named Inventor | Mohammed Selim |
| Title | Systems and Methods for Providing Video On Demand in an Intelligent Television |
| Art Unit | Not yet assigned |
| Examiner Name | Not yet assigned |
| Attorney Docket Number | 6583-440-CON |

**SIGNATURE of Applicant or Patent Practitioner**

| | | | |
|---|---|---|---|
| Signature | /Tadd F. Wilson/ | Date | 2015-09-08 |
| Name | Tadd F. Wilson | Telephone | 303-863-9700 |
| Registration Number | 54544 | | |

**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 2 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(07-12)
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# POWER OF ATTORNEY BY APPLICANT

I hereby revoke all previous powers of attorney given in the application identified in the attached transmittal letter.

☒ I hereby appoint 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 equivalent):

111285

OR

☐ I hereby appoint Practitioner(s) named below 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 equivalent):

| Name | Registration Number | Name | Registration Number |
|---|---|---|---|
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |

Please recognize or change the correspondence address for the application identified in the attached transmittal letter to:

☒ The address associated with the above-mentioned Customer Number.

OR

☐ The address associated with Customer Number:

OR

| | | | | | |
|---|---|---|---|---|---|
| ☐ Firm or individual Name | | | | | |
| Address | | | | | |
| City | | State | | Zip | |
| Country | | | | | |
| Telephone | | Email | | | |

I am the Applicant:

☐ Inventor or Joint Inventor

☐ Legal Representative of a Deceased or Legally Incapacitated Inventor

☒ Assignee or Person to Whom the Inventor is Under an Obligation to Assign

☐ 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)

**SIGNATURE of Applicant for Patent**

| | | | |
|---|---|---|---|
| Signature | Timothy L. Stewart | Date | 03/26/2013 |
| Name | Timothy L. Stewart | Telephone | 408-576-7746 |
| Title and Company | Secretary, Flextronics AP, LLC | | |

**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. Submit multiple forms for more than one signature, see below *.

☐ *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.**

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# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 23427218 |
| **Application Number:** | 14847537 |
| **International Application Number:** | |
| **Confirmation Number:** | 3161 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Customer Number:** | 111285 |
| **Filer:** | Tadd Fjelp Wilson/Amy Duarte |
| **Filer Authorized By:** | Tadd Fjelp Wilson |
| **Attorney Docket Number:** | 6583-440-CON |
| **Receipt Date:** | 08-SEP-2015 |
| **Filing Date:** | |
| **Time Stamp:** | 15:31:33 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | no |

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | Application Data Sheet | 6583-440-CON_ADS.pdf | 1821607<br>e0f406c55645b609686f22f204bedc8d1a1bd4f1 | no | 16 |

| | |
|---|---|
| **Warnings:** | |
| **Information:** | |

| | | | | | |
|---|---|---|---|---|---|
| 2 | | 6583-440-CON_SPECIFICATION.pdf | 512485<br>9f09a1c6b4258f4f58916d7729a2fe3ff1331d1c | yes | 80 |

| | Multipart Description/PDF files in .zip description | | |
|---|---|---|---|
| | **Document Description** | **Start** | **End** |
| | Specification | 1 | 74 |
| | Claims | 75 | 79 |
| | Abstract | 80 | 80 |

**Warnings:**

**Information:**

| | | | | | |
|---|---|---|---|---|---|
| 3 | Drawings-only black and white line drawings | 6583-440-CON_DRAWINGS.pdf | 4568564<br>bee3ee5fdd90503e3aed452675c623fbd4a79a45 | no | 47 |

**Warnings:**

**Information:**

| | | | | | |
|---|---|---|---|---|---|
| 4 | | Executed_Declaration.pdf | 260510<br>297098f238e5b53e7985aed0bb03772b938b50d6 | yes | 2 |

| | Multipart Description/PDF files in .zip description | | |
|---|---|---|---|
| | **Document Description** | **Start** | **End** |
| | Oath or Declaration filed | 1 | 1 |
| | Oath or Declaration filed | 2 | 2 |

**Warnings:**

**Information:**

| | | | | | |
|---|---|---|---|---|---|
| 5 | | 6583-440-CON_AmendPrelim_01.pdf | 199237<br>fcfab05b6b213450d74e78ce8693fde74bc2a5a7 | yes | 9 |

| | Multipart Description/PDF files in .zip description | | |
|---|---|---|---|
| | **Document Description** | **Start** | **End** |
| | Preliminary Amendment | 1 | 1 |
| | Specification | 2 | 2 |
| | Claims | 3 | 8 |
| | Applicant Arguments/Remarks Made in an Amendment | 9 | 9 |

| | | | | | |
|---|---|---|---|---|---|
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 6 | Power of Attorney | FlexAP_GenPOA.pdf | 460646<br>872405e5567b6c9f68a5d059adc35bdbdeb10bdd | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | | **Total Files Size (in bytes):** | 7823049 | |

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

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

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

PTO/AIA/14 (07-14)
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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 |
|---|---|---|---|---|
| | Mohammed | | Selim | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2488 Oakhaven Drive | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6M4B9 | Country [i] | CA |

**Inventor 2** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Saulo | Correia | Dourado | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2420 Ravinebrook Cres. | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6H 6Y2 | Country [i] | CA |

**Inventor 3** Remove

**Legal Name**

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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Sanjiv | | Sirpal | |

**Residence Information (Select One)** ◯ US Residency ◉ Non US Residency ◯ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| | | | |
|---|---|---|---|
| **Address 1** | 3264 Stocksbridge Avenue | | |
| **Address 2** | | | |
| **City** | Oakville | **State/Province** | ON |
| **Postal Code** | L6M 0E3 | **Country** [i] | CA |

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** | 111285 | | |
| **Email Address** | flexpatents@sheridanross.com | Add Email | Remove Email |

## Application Information:

| | | | |
|---|---|---|---|
| **Title of the Invention** | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | | |
| **Attorney Docket Number** | 6583-440-CON | **Small Entity Status Claimed** | ☐ |
| **Application Type** | Nonprovisional | | |
| **Subject Matter** | Utility | | |
| **Total Number of Drawing Sheets (if any)** | 47 | **Suggested Figure for Publication (if any)** | |

## 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 [i] |
|---|---|---|
| | | |

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. OMB 0651-0032
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

## 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:

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 | 111285 | | |

## Domestic Benefit/National Stage Information:

This section allows for the applicant to either claim benefit under 35 U.S.C. 119(e), 120, 121, 365(c), or 386(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 | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970427 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/700182 | 2012-09-12 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805038 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970388 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805003 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970409 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/798821 | 2013-03-15 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970409 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970409 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970409 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970409 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970420 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
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| 13/970420 | Claims benefit of provisional | 61/684672 | 2012-08-17 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
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| 13/970420 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
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| 13/970420 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970420 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
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| 13/970420 | Claims benefit of provisional | 61/805030 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
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| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
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| 13/970420 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
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| 13/970420 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
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| | Continuation of | 13/970442 | 2013-08-19 |
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| 13/970442 | Claims benefit of provisional | 61/684672 | 2012-08-19 |
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| 13/970442 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
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| 13/970442 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
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| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
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| 13/970442 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
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| 13/970442 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
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| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804998 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
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| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
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| 13/970442 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
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| 13/970442 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970442 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970442 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970450 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
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| 13/970450 | Claims benefit of provisional | 61/697710 | 2012-09-06 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
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| 13/970450 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
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| 13/970450 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
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| 13/970450 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
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| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805042 | 2013-03-25 |

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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Additional Domestic Benefit/National Stage Data may be generated within this form by selecting the **Add** button. | | | Add |

## 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. When priority is claimed to a foreign application that is eligible for retrieval under the priority document exchange program (PDX) [i] the information will be used by the Office to automatically attempt retrieval pursuant to 37 CFR 1.55(i)(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 [i] | Filing Date (YYYY-MM-DD) | Access Code [i] (if applicable) |
| | | | |
| Additional Foreign Priority Data may be generated within this form by selecting the **Add** button. | | | Add |

## 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

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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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.

**Applicant 1** Remove

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. [X]

| Organization Name | Flextronics AP, LLC |
|---|---|

**Mailing Address Information For Applicant:**

| | | | |
|---|---|---|---|
| **Address 1** | 6201 America Center Drive | | |
| Address 2 | | | |
| **City** | San Jose | **State/Province** | CA |
| **Country** [i] | US | Postal Code | 95002 |
| Phone Number | | Fax Number | |

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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Email Address | |
|---|---|

Additional Applicant Data may be generated within this form by selecting the Add button. Add

## 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.

Remove

If the Assignee or Non-Applicant Assignee is an Organization check here. ☐

| 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** i | | 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. Add

## Signature:

Remove

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

| **Signature** | /Tadd F. Wilson/ | | | Date (YYYY-MM-DD) | 2015-09-08 |
|---|---|---|---|---|---|
| First Name | Tadd F. | Last Name | Wilson | Registration Number | 54544 |

Additional Signature may be generated within this form by selecting the Add button. Add

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|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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.**

# 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 C o o p eration 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.

# SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION

## CROSS REFERENCE TO RELATED APPLICATION

**[0001]** The present application claims the benefits of and priority, under 35 U.S.C. § 119(e), to U.S. Provisional Application Serial Nos. 61/684,672 filed August 17, 2012, "Smart TV"; 61/702,650 filed September 18, 2012, "Smart TV"; 61/697,710 filed September 6, 2012, "Social TV"; 61/700,182 filed September 12, 2012, "Social TV Roadmap"; 61/736,692 filed December 13, 2012, "SmartTV"; 61/798,821 filed March 15, 2013, "SmartTV"; 61/804,942 filed March 25, 2013, "SmartTV"; 61/804,998 filed March 25, 2013, "SmartTV"; 61/804,971 filed March 25, 2013, "SmartTV"; 61/804,990 filed March 25, 2013, "SmartTV"; 61/805,003 filed March 25, 2013, "SmartTV"; 61/805,053 filed March 25, 2013, "SmartTV"; 61/805,030 filed March 25, 2013, "SmartTV"; 61/805,027 filed March 25, 2013, "SmartTV"; 61/805,042 filed March 25, 2013, "SmartTV"; and 61/805,038 filed March 25, 2013, "SmartTV." Each of the aforementioned documents is incorporated herein by reference in their entirety for all that they teach and for all purposes.

## BACKGROUND

**[0002]** Consolidation of device features or technological convergence is in an increasing trend. Technological convergence describes the tendency for different technological systems to evolve toward performing similar tasks. As people use more devices, the need to carry those devices, charge those devices, update software on those devices, etc. becomes more cumbersome. To compensate for these problems, technology companies have been integrating features from different devices into one or two multi-functional devices. For example, cellular phones are now capable of accessing the Internet, taking photographs, providing calendar functions, etc.

**[0003]** The consolidation trend is now affecting the design and functionality of devices generally used in the home. For example, audio receivers can access the Internet; digital video recorders can store or provide access to digital photographs, etc. The television in home audio/video systems remains a cornerstone device because the display function cannot be integrated into other devices. As such, consolidating home devices leads to integrating features and functionality into the television. The emergence of the Smart Television (Smart TV) is evidence of the trend to consolidate functionality into the television.

**[0004]** A Smart TV is generally conceived as a device that integrates access to the Internet and Web 2.0 features into television sets. The Smart TV represents the trend of technological

convergence between computers and television sets. The Smart TV generally focuses on online interactive media, Internet TV, on-demand streaming media, and generally does not focus on traditional broadcast media. Unfortunately, most Smart TVs have yet to provide seamless and intuitive user interfaces for navigating and/or executing the various features of the Smart TV. As such, there are still issues with the consolidation of features and the presentation of these features in Smart TVs.

## SUMMARY

**[0005]** There is a need for an Intelligent TV with intuitive user interfaces and with seamless user interaction capability. These and other needs are addressed by the various aspects, embodiments, and/or configurations of the present disclosure. Also, while the disclosure is presented in terms of exemplary embodiments, it should be appreciated that individual aspects of the disclosure can be separately claimed.

**[0006]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, content for VOD; determining metadata characteristics for the content; storing the metadata characteristics with the content in a database for VOD content; and providing a first view of the VOD content based on the metadata characteristics.

**[0007]** An aspect of the above method includes wherein the metadata characteristics include a location at which the content was created.

**[0008]** An aspect of the above method includes wherein the metadata characteristics include a time at which the content was created.

**[0009]** An aspect of the above method includes wherein the metadata characteristics include a genre associated with the content.

**[0010]** An aspect of the above method includes wherein the first view is sorted based on at least one of the metadata characteristics.

**[0011]** An aspect of the above method further comprises determining if a user-defined criteria exists for organizing the content.

**[0012]** An aspect of the above method further comprises: receiving a user-defined criteria; and storing the received user-defined criteria.

**[0013]** An aspect of the above method further comprises sorting the content based on the received user-defined criteria.

**[0014]** An aspect of the above method further comprises providing a second view of the content based on the sort of the content with the received user-defined criteria.

**[0015]** An aspect of the above method includes wherein the user-defined criteria include one or more of a favorite or adult-only designation.

**[0016]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a VOD data service operable to: receive content for VOD; determine metadata characteristics for the content; store the metadata characteristics with the content in a database for VOD content; and execute a user interface application in communication with the VOD data service, the user interface application operable to provide a first view of the VOD content based on the metadata characteristics.

**[0017]** An aspect of the above intelligent television system includes wherein the metadata characteristics include one or more of a location at which the content was created, a time at which the content was created, or a genre associated with the content.

**[0018]** An aspect of the above intelligent television system includes wherein the first view is sorted based on at least one of the metadata characteristics.

**[0019]** An aspect of the above intelligent television system includes wherein the VOD data service is further operable to: determine if a user-defined criteria exists for organizing the content; and sort the content based on the received user-defined criteria.

**[0020]** An aspect of the above intelligent television system includes wherein the user-defined criteria include one or more of a favorite or adult-only designation.

**[0021]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to receive content for VOD; instructions to determine metadata characteristics for the content; instructions to store the metadata characteristics with the content in a database for VOD content; and instructions to provide a first view of the VOD content based on the metadata characteristics.

**[0022]** An aspect of the above computer readable medium includes wherein the metadata characteristics include one or more of a location at which the content was created, a time at which the content was created, or a genre associated with the content.

**[0023]** An aspect of the above computer readable medium includes wherein the first view is sorted based on at least one of the metadata characteristics.

**[0024]** An aspect of the above computer readable medium further comprises instructions to: determine if a user-defined criteria exists for organizing the content; and sort the content based on the received user-defined criteria.

**[0025]** An aspect of the above computer readable medium includes wherein the user-defined criteria include one or more of a favorite or adult-only designation.

**[0026]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, a first selection for VOD content; in response to the first selection, providing a master view of VOD content; receiving a second selection for VOD content; in response to the second selection, providing a collection view of the VOD content; receiving a third selection for VOD content; and in response to the third selection, providing either a detail view or a digest view of the VOD content.

**[0027]** An aspect of the above method further comprises: determining if the selection in the collection view is for a series or one of a movie or single show; if the selection in the collection view is for a series, providing the digest view; and if the selection in the collection view is for one of a movie or single show, providing a detail view.

**[0028]** An aspect of the above method includes wherein the digest view provides a listing of two or more episodes associated with the series.

**[0029]** An aspect of the above method further comprises: receiving a fourth selection of an episode in the digest view; and in response to the fourth selection, providing a player to present the episode to the user.

**[0030]** An aspect of the above method further comprises: receiving a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, providing a player to present the movie or single show to the user.

**[0031]** An aspect of the above method includes wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

**[0032]** An aspect of the above method includes wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria.

**[0033]** An aspect of the above method includes wherein the master view includes a navigation bar to select between types of content.

**[0034]** An aspect of the above method includes wherein the types of content include showcase content, movies content, television series content, or variety content.

**[0035]** An aspect of the above method includes wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

**[0036]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: receive a first selection for VOD content; in response to the first selection, provide a master view of VOD content; receive a second selection for VOD content; in response to the second selection, provide a collection view of the VOD content; receive a third selection for VOD content; and in response to the third selection, provide either a detail view or a digest view of the VOD content.

**[0037]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: determine if the selection in the collection view is for a series or one of a movie or single show; if the selection in the collection view is for a series, provide the digest view, wherein the digest view provides a listing of two or more episodes associated with the series; if the selection in the collection view is for one of a movie or single show, provide a detail view; receive a fourth selection of an episode in the digest view; and in response to the fourth selection, provide a player to present the episode to the user.

**[0038]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user.

**[0039]** An aspect of the above intelligent television system includes wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

**[0040]** An aspect of the above intelligent television system includes wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

**[0041]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to receive a first selection for VOD content; in response to the first selection, instructions to provide a master view of VOD content; instructions to receive a second

selection for VOD content; in response to the second selection, instructions to provide a collection view of the VOD content; instructions to receive a third selection for VOD content; and in response to the third selection, instructions to provide either a detail view or a digest view of the VOD content.

**[0042]** An aspect of the above computer readable medium further comprises instructions to: determine if the selection in the collection view is for a series or one of a movie or single show; if the selection in the collection view is for a series, provide the digest view, wherein the digest view provides a listing of two or more episodes associated with the series; if the selection in the collection view is for one of a movie or single show, provide a detail view; receive a fourth selection of an episode in the digest view; and in response to the fourth selection, provide a player to present the episode to the user.

**[0043]** An aspect of the above computer readable medium further comprises instructions to: receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user.

**[0044]** An aspect of the above computer readable medium includes wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

**[0045]** An aspect of the above computer readable medium includes wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

**[0046]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, a selection for VOD content; providing a first user interface having a selection for one or more of showcase content, movie content, television content, or variety content; receiving a second selection; determining whether the second selection is for showcase content, movie content, television content, or variety content; and based on the determination, provide a second user interface having content associated showcase content, movie content, television content, or variety content.

**[0047]** An aspect of the above method includes wherein the selections for showcase content, movie content, television content, or variety content are provided in a navigation bar.

**[0048]** An aspect of the above method includes wherein the second selection is in the navigation bar.

**[0049]** An aspect of the above method includes wherein a third user interface is associated with showcase content, wherein the third user interface includes first set of user-selectable devices for one or more of last viewed content, top watched content, high definition content, or special topics content.

**[0050]** An aspect of the above method includes wherein a fourth user interface is associated with television content, wherein the fourth user interface includes second set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content.

**[0051]** An aspect of the above method includes wherein a fifth user interface is associated with variety content, wherein the fifth user interface includes third set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content.

**[0052]** An aspect of the above method includes wherein a sixth user interface is associated with movie content, wherein the sixth user interface includes fourth set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content.

**[0053]** An aspect of the above method includes wherein a first user interface is a master view of all content.

**[0054]** An aspect of the above method includes wherein the first user interface includes fifth set of user-selectable devices for one or more of last watched content, top watched content, high definition content, or special topics content.

**[0055]** An aspect of the above method includes wherein at least one user-selectable device in the first, second, third, fourth, or fifth set of user-selectable devices includes revolving thumbnails associated with at least two different items of content.

**[0056]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: receive a selection for VOD content; provide a first user interface have a selection for one or more of showcase content, movie content, television content, or variety content; receive a second selection; determine whether the second selection is for showcase content, movie content, television content, or

variety content; and based on the determination, provide a second user interface have content associated showcase content, movie content, television content, or variety content.

**[0057]** An aspect of the above intelligent television system includes wherein the selections for showcase content, movie content, television content, or variety content are provided in a navigation bar, and wherein the second selection is in the navigation bar.

**[0058]** An aspect of the above intelligent television system includes wherein a third user interface is associated with showcase content, wherein the third user interface includes first set of user-selectable devices for one or more of last viewed content, top watched content, high definition content, or special topics content, wherein a fourth user interface is associated with television content, wherein the fourth user interface includes second set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content, wherein a fifth user interface is associated with variety content, wherein the fifth user interface includes third set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content, and wherein a sixth user interface is associated with movie content, wherein the sixth user interface includes fourth set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content.

**[0059]** An aspect of the above intelligent television system includes wherein a first user interface is a master view of all content, and wherein the first user interface includes fifth set of user-selectable devices for one or more of last watched content, top watched content, high definition content, or special topics content.

**[0060]** An aspect of the above intelligent television system includes wherein at least one user-selectable device in the first, second, third, fourth, or fifth set of user-selectable devices includes revolving thumbnails associated with at least two different items of content.

**[0061]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to receive a selection for VOD content; instructions to provide a first user interface have a selection for one or more of showcase content, movie content, television content, or variety content; instructions to receive a second selection; instructions to determine whether the second selection is for showcase content, movie content, television content, or variety content; and based on the determination, instructions to provide a second user interface have content associated showcase content, movie content, television content, or variety content.

**[0062]** An aspect of the above computer readable medium includes wherein the selections for showcase content, movie content, television content, or variety content are provided in a navigation bar, and wherein the second selection is in the navigation bar.

**[0063]** An aspect of the above computer readable medium includes wherein a third user interface is associated with showcase content, wherein the third user interface includes first set of user-selectable devices for one or more of last viewed content, top watched content, high definition content, or special topics content, wherein a fourth user interface is associated with television content, wherein the fourth user interface includes second set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content, wherein a fifth user interface is associated with variety content, wherein the fifth user interface includes third set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content, and wherein a sixth user interface is associated with movie content, wherein the sixth user interface includes fourth set of user-selectable devices for one or more of new content, top watched content, recommended content, or special topics content.

**[0064]** An aspect of the above computer readable medium includes wherein a first user interface is a master view of all content, and wherein the first user interface includes fifth set of user-selectable devices for one or more of last watched content, top watched content, high definition content, or special topics content.

**[0065]** An aspect of the above computer readable medium includes wherein at least one user-selectable device in the first, second, third, fourth, or fifth set of user-selectable devices includes revolving thumbnails associated with at least two different items of content.

**[0066]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: providing a first collection view of VOD content; receiving, by a processor of the intelligent television, a first selection to filter the VOD content; determining content applicable to the received selection; and providing a second collection view of the filtered content.

**[0067]** An aspect of the above method further comprises determining if the first selection is a last filter selection.

**[0068]** An aspect of the above method includes wherein if the first selection is not the last filter selection, further comprising: receiving, by a processor of the intelligent television, a second selection to filter the VOD content; determining content applicable to the second received selection; and providing a third collection view of the filtered content.

**[0069]** An aspect of the above method includes wherein if the first selection is not the last filter selection, further comprising: receiving a third selection of an item of content in the second collection view; and providing a detail view of the selected content.

**[0070]** An aspect of the above method includes wherein the first selection to filter includes a filter criteria.

**[0071]** An aspect of the above method includes wherein the filter criteria is a location where the content was made.

**[0072]** An aspect of the above method includes wherein the filter criteria is a year at which the content was made.

**[0073]** An aspect of the above method includes wherein the filter criteria is a genre associated with the content.

**[0074]** An aspect of the above method includes wherein the first criteria include two or more of the location, the year, and the genre.

**[0075]** An aspect of the above method includes wherein the detail view includes a description portion and a user-selectable device to play the content.

**[0076]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: provide a first collection view of VOD content; receive a first selection to filter the VOD content; determine content applicable to the received selection; and provide a second collection view of the filtered content.

**[0077]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: wherein if the first selection is not the last filter selection, receive, by a processor of the intelligent television, a second selection to filter the VOD content; determine content applicable to the second received selection; provide a third collection view of the filtered content; wherein if the first selection is not the last filter selection, receive a third selection of an item of content in the second collection view; and provide a detail view of the selected content.

**[0078]** An aspect of the above intelligent television system includes wherein the first selection to filter includes a filter criteria.

**[0079]** An aspect of the above intelligent television system includes wherein the filter criteria is one of a location where the content was made, a year at which the content was made, or a genre associated with the content.

**[0080]** An aspect of the above intelligent television system includes wherein the first criteria include two or more of the location, the year, and the genre.

**[0081]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to provide a first collection view of VOD content; instructions to receive a first selection to filter the VOD content; instructions to determine content applicable to the received selection; and instructions to provide a second collection view of the filtered content.

**[0082]** An aspect of the above computer readable medium further comprises instructions to: wherein if the first selection is not the last filter selection, receive, by a processor of the intelligent television, a second selection to filter the VOD content; determine content applicable to the second received selection; provide a third collection view of the filtered content; wherein if the first selection is not the last filter selection, receive a third selection of an item of content in the second collection view; and provide a detail view of the selected content.

**[0083]** An aspect of the above computer readable medium includes wherein the first selection to filter includes a filter criteria.

**[0084]** An aspect of the above computer readable medium includes wherein the filter criteria is one of a location where the content was made, a year at which the content was made, or a genre associated with the content.

**[0085]** An aspect of the above computer readable medium includes wherein the first criteria include two or more of the location, the year, and the genre.

**[0086]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, a filter criteria; providing a catalog view of one or more television series associated with the filter criteria; receiving a selection of a television series from the catalog view; determining if the television series includes one season; and if there is only one season, providing a first digest view of the season.

**[0087]** An aspect of the above method further comprises, if there is more than one season, providing a second digest view having two or more seasons in date order.

**[0088]** An aspect of the above method includes wherein the two or more seasons are ordered from most recent season to least recent season.

**[0089]** An aspect of the above method further comprises determining if the season is fully archived.

**[0090]** An aspect of the above method further comprises if the season is fully archived, providing the series view with two or more episodes with a first date order.

**[0091]** An aspect of the above method includes wherein the first date order is from first episode to last episode.

**[0092]** An aspect of the above method further comprises if the season is fully archived, providing the series view with two or more episodes with a second date order.

**[0093]** An aspect of the above method includes wherein the second date order is from most recent episode to oldest episode.

**[0094]** An aspect of the above method further comprises receiving a second selection of an episode.

**[0095]** An aspect of the above method further comprises playing the episode.

**[0096]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: receive a filter criteria; provide a catalog view of one or more television series associated with the filter criteria; receive a selection of a television series from the catalog view; determine if the television series includes one season; and if there is only one season, provide a first digest view of the season.

**[0097]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to, if there is more than one season, provide a second digest view having two or more seasons in date order, wherein the two or more seasons are ordered from most recent season to least recent season.

**[0098]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: determine if the season is fully archived; and if the season is fully archived provide the series view with two or more episodes with a first date order, wherein the first date order is from first episode to last episode.

**[0099]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to, if the season is fully archived, provide the series view with two or more episodes with a second date order, wherein the second date order is from most recent episode to oldest episode.

**[0100]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: receive a second selection of an episode; and play the episode.

**[0101]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to receive a filter criteria; instructions to provide a catalog view of one or more television series associated with the filter criteria; instructions to receive a selection of a

television series from the catalog view; instructions to determine if the television series includes one season; and if there is only one season, instructions to provide a first digest view of the season.

**[0102]** An aspect of the above computer readable medium further comprises instructions to if there is more than one season, provide a second digest view having two or more seasons in date order, wherein the two or more seasons are ordered from most recent season to least recent season.

**[0103]** An aspect of the above computer readable medium further comprises instructions to: determine if the season is fully archived; and if the season is fully archived provide the series view with two or more episodes with a first date order, wherein the first date order is from first episode to last episode.

**[0104]** An aspect of the above computer readable medium further comprises instructions to, if the season is fully archived, provide the series view with two or more episodes with a second date order, wherein the second date order is from most recent episode to oldest episode.

**[0105]** An aspect of the above computer readable medium further comprises instructions to: receive a second selection of an episode; and play the episode.

**[0106]** A method for providing one of two types of user interfaces in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, a filter criteria; providing a catalog view of one or more television series associated with the filter criteria; receiving a selection of a television series from the catalog view; determining if the television series includes one season; if there is only one season, providing a first digest view of the season; receiving a second selection of an episode; and playing the episode in a series player including a user-selectable device to navigate to at least one of a next episode or a previous episode.

**[0107]** An aspect of the above method includes wherein the series player includes a playback control.

**[0108]** An aspect of the above method includes wherein the user-selectable device is associated with the playback control.

**[0109]** An aspect of the above method includes wherein the playback control is in a footer.

**[0110]** An aspect of the above method includes wherein a first user-selectable device for the previous episode is provided to a left of the playback control in the footer.

**[0111]** An aspect of the above method includes wherein a second user-selectable device for the next episode is provided to a right of the playback control in the footer.

**[0112]** An aspect of the above method includes wherein the playback control includes selections to rewind the episode, forward the episode, play the episode, and pause the episode.

**[0113]** An aspect of the above method includes wherein the first and second user-selectable devices include thumbnails representing the previous and next episode.

**[0114]** An aspect of the above method includes wherein the first and second user-selectable devices include names for the previous and next episode.

**[0115]** An aspect of the above method includes wherein selecting the first or second user-selectable devices begins a playback of the previous or next episode.

**[0116]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: receive, by a processor of the intelligent television, a filter criteria; provide a catalog view of one or more television series associated with the filter criteria; receive a selection of a television series from the catalog view; determine if the television series includes one season; if there is only one season, provide a first digest view of the season; receive a second selection of an episode; and play the episode in a series player including a user-selectable device to navigate to at least one of a next episode or a previous episode.

**[0117]** An aspect of the above intelligent television system includes wherein the series player includes a playback control, wherein the user-selectable device is associated with the playback control, and wherein the playback control is in a footer.

**[0118]** An aspect of the above intelligent television system includes wherein a first user-selectable device for the previous episode is provided to a left of the playback control in the footer, wherein a second user-selectable device for the next episode is provided to a right of the playback control in the footer, and wherein the playback control includes selections to rewind the episode, forward the episode, play the episode, and pause the episode.

**[0119]** An aspect of the above intelligent television system includes wherein the first and second user-selectable devices include thumbnails representing the previous and next episode, and wherein the first and second user-selectable devices include names for the previous and next episode.

**[0120]** An aspect of the above intelligent television system includes wherein selecting the first or second user-selectable devices begins a playback of the previous or next episode.

**[0121]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising:

instructions to receive, by a processor of the intelligent television, a filter criteria; instructions to provide a catalog view of one or more television series associated with the filter criteria; instructions to receive a selection of a television series from the catalog view; instructions to determine if the television series includes one season; if there is only one season, instructions to provide a first digest view of the season; instructions to receive a second selection of an episode; and instructions to play the episode in a series player including a user-selectable device to navigate to at least one of a next episode or a previous episode.

**[0122]** An aspect of the above computer readable medium includes wherein the series player includes a playback control, wherein the user-selectable device is associated with the playback control, and wherein the playback control is in a footer.

**[0123]** An aspect of the above computer readable medium includes wherein a first user-selectable device for the previous episode is provided to a left of the playback control in the footer, wherein a second user-selectable device for the next episode is provided to a right of the playback control in the footer, and wherein the playback control includes selections to rewind the episode, forward the episode, play the episode, and pause the episode.

**[0124]** An aspect of the above computer readable medium includes wherein the first and second user-selectable devices include thumbnails representing the previous and next episode, and wherein the first and second user-selectable devices include names for the previous and next episode.

**[0125]** An aspect of the above computer readable medium includes wherein selecting the first or second user-selectable devices begins a playback of the previous or next episode.

**[0126]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: providing, by a processor of the intelligent television, a catalog view of two or more items of content; receiving a selection to sort the items of content based on a watched status; and providing a second catalog view where two or more items of content are presented, wherein the presented items of content have the selected watch status.

**[0127]** An aspect of the above method includes wherein the selection is made with a watched toggle.

**[0128]** An aspect of the above method includes wherein the watched status is a not watched status.

**[0129]** An aspect of the above method includes wherein the presented items of content have not been viewed.

**[0130]** An aspect of the above method includes wherein the watched status is a partially watched status.

**[0131]** An aspect of the above method includes wherein the presented items of content have been partially viewed.

**[0132]** An aspect of the above method includes wherein the watched status is a fully watched status.

**[0133]** An aspect of the above method includes wherein the presented items of content have been fully viewed.

**[0134]** An aspect of the above method includes wherein the watched toggle is associated with a hot button key in the catalog view and the second catalog view.

**[0135]** An aspect of the above method includes wherein the watched toggle is associated with a remote hot button key on a remote control.

**[0136]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: provide a catalog view of two or more items of content; receive a selection to sort the items of content based on a watched status; and provide a second catalog view where two or more items of content are presented, wherein the presented items of content have the selected watch status.

**[0137]** An aspect of the above intelligent television system includes wherein the selection is made with a watched toggle, wherein the watched toggle is associated with a hot button key in the catalog view and the second catalog view, and wherein the watched toggle is associated with a remote hot button key on a remote control.

**[0138]** An aspect of the above intelligent television system includes wherein the watched status is a not watched status, and wherein the presented items of content have not been viewed.

**[0139]** An aspect of the above intelligent television system includes wherein the watched status is a partially watched status, and wherein the presented items of content have been partially viewed.

**[0140]** An aspect of the above intelligent television system includes wherein the watched status is a fully watched status, and wherein the presented items of content have been fully viewed.

**[0141]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising: instructions to provide a catalog view of two or more items of content; instructions to receive a selection to sort the items of content based on a watched status; and instructions to provide

a second catalog view where two or more items of content are presented, wherein the presented items of content have the selected watch status.

**[0142]** An aspect of the above computer readable medium includes wherein the selection is made with a watched toggle, wherein the watched toggle is associated with a hot button key in the catalog view and the second catalog view, and wherein the watched toggle is associated with a remote hot button key on a remote control.

**[0143]** An aspect of the above computer readable medium includes wherein the watched status is a not watched status, and wherein the presented items of content have not been viewed.

**[0144]** An aspect of the above computer readable medium includes wherein the watched status is a partially watched status, and wherein the presented items of content have been partially viewed.

**[0145]** An aspect of the above computer readable medium includes wherein the watched status is a fully watched status, and wherein the presented items of content have been fully viewed.

**[0146]** A method for providing video-on-demand (VOD) in an intelligent television, the method comprising: providing, by a processor of the intelligent television, a catalog view for an item of content; receiving a selection to play content; determining if a user has previously watched the content; and if the user has previously watched the content, prompting the user if the user desires to resume watching the content.

**[0147]** An aspect of the above method further comprises if the user has not previously watched the content, playing the content from a beginning of the content.

**[0148]** An aspect of the above method includes wherein a watch status for the content is stored in a database.

**[0149]** An aspect of the above method includes wherein the intelligent television retrieves the watch status to determine if the user previously watched the content.

**[0150]** An aspect of the above method includes wherein the watch status is associated with the content in the database.

**[0151]** An aspect of the above method further comprises receiving a playback controls selection.

**[0152]** An aspect of the above method further comprises, in response to receiving the playback controls selection, providing the playback controls for a predetermined amount of time.

**[0153]** An aspect of the above method includes wherein the playback controls are in a footer.

**[0154]** An aspect of the above method includes wherein a first user-selectable device for the previous episode is provided to a left of the playback controls in the footer, wherein a second user-selectable device for the next episode is provided to a right of the playback controls in the footer.

**[0155]** An aspect of the above method includes wherein the playback controls includes selections to rewind the episode, forward the episode, play the episode, and pause the episode.

**[0156]** An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content; a processor in communication with the memory, the processor operable to: execute a user interface application operable to: provide, by a processor of the intelligent television, a catalog view for an item of content; receive a selection to play content; determine if a user has previously watched the content; and if the user has previously watched the content, prompt the user if the user desires to resume watching the content.

**[0157]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to, if the user has not previously watched the content, play the content from a beginning of the content.

**[0158]** An aspect of the above intelligent television system includes wherein a watch status for the content is stored in a database, wherein the intelligent television retrieves the watch status to determine if the user previously watched the content, and wherein the watch status is associated with the content in the database.

**[0159]** An aspect of the above intelligent television system includes wherein the user interface application is further operable to: receive a playback controls selection; and in response to receiving the playback controls selection, provide the playback controls for a predetermined amount of time.

**[0160]** An aspect of the above intelligent television system includes wherein the playback controls are in a footer, wherein a first user-selectable device for the previous content is provided to a left of the playback controls in the footer, wherein a second user-selectable device for the next content is provided to a right of the playback controls in the footer, and wherein the playback controls include selections to rewind the content, forward the content, play the content, and pause the content.

**[0161]** A computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising:

instructions to provide, by a processor of the intelligent television, a catalog view for an item of content; receive a selection to play content; determine if a user has previously watched the content; and if the user has previously watched the content, prompt the user if the user desires to resume watching the content.

**[0162]** An aspect of the above computer readable medium includes wherein the user interface application is further operable to, if the user has not previously watched the content, play the content from a beginning of the content.

**[0163]** An aspect of the above computer readable medium includes wherein a watch status for the content is stored in a database, wherein the intelligent television retrieves the watch status to determine if the user previously watched the content, and wherein the watch status is associated with the content in the database.

**[0164]** An aspect of the above computer readable medium further comprises instructions to: receive a playback controls selection; and in response to receiving the playback controls selection, provide the playback controls for a predetermined amount of time.

**[0165]** An aspect of the above computer readable medium includes wherein the playback controls are in a footer, wherein a first user-selectable device for the previous content is provided to a left of the playback controls in the footer, wherein a second user-selectable device for the next content is provided to a right of the playback controls in the footer, and wherein the playback controls include selections to rewind the content, forward the content, play the content, and pause the content.

**[0166]** The systems and methods herein provide new user interfaces for providing VOD with the Intelligent TV. The user interfaces have an intuitive layout, structure, organization, and methodology. Thus, the user can more easily learn and navigate the options associated with VOD with the Intelligent TV.

**[0167]** The phrases "at least one", "one or more", and "and/or" are open-ended expressions that are both conjunctive and disjunctive in operation. For example, each of the expressions "at least one of A, B and C", "at least one of A, B, or C", "one or more of A, B, and C", "one or more of A, B, or C" and "A, B, and/or C" means A alone, B alone, C alone, A and B together, A and C together, B and C together, or A, B and C together.

**[0168]** The term "a" or "an" entity refers to one or more of that entity. As such, the terms "a" (or "an"), "one or more" and "at least one" can be used interchangeably herein. It is also to be noted that the terms "comprising", "including", and "having" can be used interchangeably.

**[0169]** The term "automatic" and variations thereof, as used herein, refers to any process or operation done without material human input when the process or operation is performed. However, a process or operation can be automatic, even though performance of the process or operation uses material or immaterial human input, if the input is received before performance of the process or operation. Human input is deemed to be material if such input influences how the process or operation will be performed. Human input that consents to the performance of the process or operation is not deemed to be "material."

**[0170]** A "blog" (a blend of the term ***web log***) is a type of website or part of a website supposed to be updated with new content from time to time. Blogs are usually maintained by an individual with regular entries of commentary, descriptions of events, or other material such as graphics or video. Entries are commonly displayed in reverse-chronological order.

**[0171]** A "blogging service" is a blog-publishing service that allows private or multi-user blogs with time-stamped entries.

**[0172]** The term "cable TV" refers to a system of distributing television programs to subscribers via radio frequency (RF) signals transmitted through coaxial cables or light pulses through fiber-optic cables. This contrasts with traditional broadcast television (terrestrial television) in which the television signal is transmitted over the air by radio waves and received by a television antenna attached to the television.

**[0173]** The term "channel" or "television channel," as used herein, can be a physical or virtual channel over which a television station or television network is distributed. A physical cannel in analog television can be an amount of bandwidth, typically 6, 7, or 8 MHz, that occupies a predetermine channel frequency. A virtual channel is a representation, in cable or satellite television, of a data stream for a particular television media provider (e.g., CDS, TNT, HBO, etc.).

**[0174]** The term "computer-readable medium," as used herein, refers to any tangible storage and/or transmission medium that participate in providing instructions to a processor for execution. Such a medium may take many forms, including but not limited to, non-volatile media, volatile media, and transmission media. Non-volatile media includes, for example, NVRAM, or magnetic or optical disks. Volatile media includes dynamic memory, such as main memory. Common *form*s of computer-readable media include, for example, a floppy disk, a flexible disk, hard disk, magnetic tape, or any other magnetic medium, magneto-optical medium, a CD-ROM, any other optical medium, punch cards, paper tape, any other physical medium with patterns of holes, a RAM, a PROM, and EPROM, a FLASH-EPROM, a solid state medium like a memory card, any other memory chip or cartridge, a

carrier wave as described hereinafter, or any other medium from which a computer can read. A digital file attachment to e-mail or other self-contained information archive or set of archives is considered a distribution medium equivalent to a tangible storage medium. When the computer-readable media is configured as a database, it is to be understood that the database may be any type of database, such as relational, hierarchical, object-oriented, and/or the like. Accordingly, the disclosure is considered to include a tangible storage medium or distribution medium and prior art-recognized equivalents and successor media, in which the software implementations of the present disclosure are stored.

**[0175]** The term "enhanced television" (ETV) refers to a collection of specifications developed under the OpenCable project of CableLabs (Cable Television Laboratories, Inc.) that define an ETV Application consisting of resources (files) adhering to the Enhanced TV Binary Interchange Format (EBIF) content format as well as PNG images, JPEG images, and PFR downloadable fonts. An ETV application is normally delivered through an MPEG transport stream and accompanies an MPEG program containing video and audio elementary streams. An "ETV Application" is a collection of resources (files) that include one or more EBIF resources that represent viewable information in the form of pages. Two forms of a given ETV Application may be distinguished: (1) an interchange form and (2) an execution form. The interchange form of an ETV Application consists of the resources (files) that represent the compiled application prior to its actual execution by an ETV User Agent. The execution form of an ETV Application consists of the stored, and possibly mutated forms of these resources while being decoded, presented, and executed by an ETV User Agent. An "ETV User Agent" is a software component that operates on a set-top box, a television, or any other computing environment capable of receiving, decoding, presenting, and processing an ETV Application. This component usually provides, along with its host hardware environment, one or more mechanisms for an end-user to navigate and interact with the multimedia content represented by ETV Applications.

**[0176]** The term "high-definition television" (HDTV) provides a resolution that is substantially higher than that of standard-definition television. HDTV may be transmitted in various formats, namely 1080p - 1920×1080p: 2,073,600 pixels (approximately 2.1 megapixels) per frame, 1080i (which is typically either 1920×1080i: 1,036,800 pixels (approximately 1 megapixel) per field or 2,073,600 pixels (approximately 2.1 megapixels) per frame or 1440×1080i:[1] 777,600 pixels (approximately 0.8 megapixels) per field or 1,555,200 pixels (approximately 1.6 megapixels) per frame), or 720p - 1280×720p: 921,600 pixels (approximately 0.9 megapixels) per frame. As will be appreciated, "frame size" in

pixels is defined as number of horizontal pixels × number of vertical pixels, for example 1280 × 720 or 1920 × 1080. Often the number of horizontal pixels is implied from context and is omitted, as in the case of 720p and 1080p, "scanning system" is identified with the letter "p" for progressive scanning or "i" for interlaced scanning, and "frame rate" is identified as number of video frames per second. For interlaced systems an alternative form of specifying number of fields per second is often used. For purposes of this disclosure, "high-definition television" is deemed to include other high-definition analog or digital video formats, including ultra high definition television.

**[0177]** The term "internet television" (otherwise known as Internet TV, Online Television, or Online TV) is the digital distribution of television content via the Internet. It should not be confused with Web television - short programs or videos created by a wide variety of companies and individuals, or Internet protocol television (IPTV) - an emerging internet technology standard for use by television broadcasters. Internet Television is a general term that covers the delivery of television shows and other video content over the internet by video streaming technology, typically by major traditional television broadcasters. It does not describe a technology used to deliver content (see Internet protocol television). Internet television has become very popular through services such as RTÉ Player in Ireland; BBC iPlayer, 4oD, ITV Player (also STV Player and UTV Player) and Demand Five in the United Kingdom; Hulu in the United States; Nederland 24 in the Netherlands; ABC iview and Australia Live TV in Australia; Tivibu in Turkey; and iWanTV! in the Philippines.

**[0178]** The term "internet protocol television" (IPTV) refers to a system through which television services are delivered using the Internet protocol suite over a packet-switched network such as the Internet, instead of being delivered through traditional terrestrial, satellite signal, and cable television formats. IPTV services may be classified into three main groups, namely live television, with or without interactivity related to the current TV show; time-shifted television: catch-up TV (replays a TV show that was broadcast hours or days ago), start-over TV (replays the current TV show from its beginning); and video-on-demand (VOD): browse a catalog of videos, not related to TV programming. IPTV is distinguished from Internet television by its on-going standardization process (e.g., European Telecommunications Standards Institute) and preferential deployment scenarios in subscriber-based telecommunications networks with high-speed access channels into end-user premises via set-top boxes or other customer-premises equipment.

**[0179]** The term "silo," as used herein, can be a logical representation of an input, source, or application. An input can be a device or devices (e.g., DVD, VCR, etc.) electrically

connected to the television through a port (e.g., HDMI, video/audio inputs, etc.) or through a network (*e.g.*, LAN WAN, etc.). Rather than a device or devices, the input could be configured as an electrical or physical connection to one or more devices. A source, particularly a content source, can be a data service that provides content (e.g., a media center, a file system, etc.). An application can be a software service that provides a particular type of function (e.g., Live TV, VOD, User Applications, photograph display, etc.). The silo, as a logical representation, can have an associated definition or property, such as a setting, feature, or other characteristic.

**[0180]** The term "panel," as used herein, can mean a user interface displayed in at least a portion of the display. The panel may be interactive (e.g., accepts user input) or informational (e.g., does not accept user input). A panel may be translucent whereby the panel obscures but does not mask the underlying content being displayed in the display. Panels may be provided in response to a user input from a button or remote control interface.

**[0181]** The term "screen," as used herein, refers to a physical structure that includes one or more hardware components that provide the device with the ability to render a user interface and/or receive user input. A screen can encompass any combination of gesture capture region, a touch sensitive display, and/or a configurable area. The device can have one or more physical screens embedded in the hardware. However a screen may also include an external peripheral device that may be attached and detached from the device. In embodiments, multiple external devices may be attached to the device. For example, another screen may be included with a remote control unit that interfaces with the Intelligent TV.

**[0182]** The term "media" of "multimedia," as used herein, refers to content that may assume one of a combination of different content forms. Multimedia can include one or more of, but is not limited to, text, audio, still images, animation, video, or interactivity content forms.

**[0183]** The term "Intelligent TV," as used herein, refers to a television configured to provide one or more intuitive user interfaces and interactions based on a unique application platform and architecture. The Intelligent TV utilizes processing resources associated with the television to integrate Internet connectivity with parallel application functionality. This integration allows a user the ability to intuitively access various sources of media and content (e.g., Internet, over-the-top content, on-demand streaming media, over-the-air broadcast media, and/or other forms of information) via the Intelligent TV in a quick and efficient manner. The Intelligent TV can be a soft television. Although the Intelligent TV disclosed herein may comprise one or more components of a "smart TV," it is an aspect of the

Intelligent TV to provide expanded intuitive user interaction capability for navigating and executing the various features of the television. A "smart TV," sometimes referred to as a connected TV, or hybrid TV (not to be confused with IPTV, Internet TV, or with Web TV), describes a trend of integration of the Internet and Web 2.0 features into television sets and set-top boxes, as well as the technological convergence between computers and these television sets/set-top boxes. The smart TV devices have a higher focus on online interactive media, Internet TV, over-the-top content, as well as on-demand streaming media, and less focus on traditional broadcast media than traditional television sets and set-top boxes. As can be appreciated, the Intelligent TV encompasses a broader range of technology than that of the smart TV defined above.

**[0184]** The term "television" is a telecommunication medium, device (or set) or set of associated devices, programming, and/or transmission for transmitting and receiving moving images that can be monochrome (black-and-white) or colored, with or without accompanying sound. Different countries use one of the three main video standards for TVs, namely PAL, NTSC or SECAM. Television is most commonly used for displaying broadcast television signals. The broadcast television system is typically disseminated via radio transmissions on designated channels in the 54–890 MHz frequency band. A common television set comprises multiple internal electronic circuits, including those for receiving and decoding broadcast signals. A visual display device which lacks a tuner is properly called a video monitor, rather than a television. A television may be different from other monitors or displays based on the distance maintained between the user and the television when the user watches the media and based on the inclusion of a tuner or other electronic circuit to receive the broadcast television signal.

**[0185]** The term "Live TV," as used herein, refers to a television production broadcast in real-time, as events happen, in the present.

**[0186]** The term "standard-definition television" (SDTV) is a television system that uses a resolution that is not considered to be either high-definition television (HDTV 720p and 1080p) or enhanced-definition television (EDTV 480p). The two common SDTV signal types are 576i, with 576 interlaced lines of resolution, derived from the European-developed PAL and SECAM systems; and 480i based on the American National Television System Committee NTSC system. In the US, digital SDTV is broadcast in the same 4:3 aspect ratio as NTSC signals. However, in other parts of the world that used the PAL or SECAM analog standards, standard-definition television is now usually shown with a 16:9 aspect ratio. Standards that support digital SDTV broadcast include DVB, ATSC and ISDB. Television

signals are transmitted in digital form, and their pixels have a rectangular shape, as opposed to square pixels that are used in modern computer monitors and modern implementations of HDTV. The table below summarizes pixel aspect ratios for various kinds of SDTV video signal. Note that the actual image (be it 4:3 or 16:9) is always contained in the center 704 horizontal pixels of the digital frame, regardless of how many horizontal pixels (704 or 720) are used. In case of digital video signal having 720 horizontal pixels, only the center 704 pixels contain actual 4:3 or 16:9 image, and the 8 pixel wide stripes from either side are called nominal analogue blanking and should be discarded before displaying the image. Nominal analogue blanking should not be confused with overscan, as overscan areas are part of the actual 4:3 or 16:9 image.

**[0187]** The term "video on demand (VOD)," or "video-on-demand," as used herein, refers to systems and processes which allow users to select and watch/listen to video or audio content on demand. VOD systems may stream content, to view the content in real time, or download the content to a storage medium for viewing at a later time.

**[0188]** The term "satellite positioning system receiver" refers to a wireless receiver or transceiver to receive and/or send location signals from and/or to a satellite positioning system, such as the Global Positioning System ("GPS") (US), GLONASS (Russia), Galileo positioning system (EU), Compass navigation system (China), and Regional Navigational Satellite System (India).

**[0189]** The term "display," as used herein, refers to at least a portion of a screen used to display the output of the television to a user. A display may be a single-screen display or a multi-screen display, referred to as a composite display. A composite display can encompass the touch sensitive display of one or more screens. A single physical screen can include multiple displays that are managed as separate logical displays. Thus, different content can be displayed on the separate displays although part of the same physical screen.

**[0190]** The term "displayed image," as used herein, refers to an image produced on the display. A typical displayed image is a television broadcast or menu. The displayed image may occupy all or a portion of the display.

**[0191]** The term "display orientation," as used herein, refers to the way in which a rectangular display is oriented by a user for viewing. The two most common types of display orientation are portrait and landscape. In landscape mode, the display is oriented such that the width of the display is greater than the height of the display (such as a 4:3 ratio, which is 4 units wide and 3 units tall, or a 16:9 ratio, which is 16 units wide and 9 units tall). Stated differently, the longer dimension of the display is oriented substantially horizontal in

landscape mode while the shorter dimension of the display is oriented substantially vertical. In the portrait mode, by contrast, the display is oriented such that the width of the display is less than the height of the display. Stated differently, the shorter dimension of the display is oriented substantially horizontal in the portrait mode while the longer dimension of the display is oriented substantially vertical.

**[0192]** The term "module," as used herein, refers to any known or later developed hardware, software, firmware, artificial intelligence, fuzzy logic, or combination of hardware and software that is capable of performing the functionality associated with that element.

**[0193]** The terms "determine," "calculate" and "compute," and variations thereof, as used herein, are used interchangeably and include any type of methodology, process, mathematical operation or technique.

**[0194]** The term "touch screen" or "touchscreen" refer to screen that can receive user contact or other tactile input, such as a stylus. The touch screen may sense user contact in a number of different ways, such as by a change in an electrical parameter (e.g., resistance or capacitance), acoustic wave variations, infrared radiation proximity detection, light variation detection, and the like. In a resistive touch screen, for example, normally separated conductive and resistive metallic layers in the screen pass an electrical current. When a user touches the screen, the two layers make contact in the contacted location, whereby a change in electrical field is noted and the coordinates of the contacted location calculated. In a capacitive touch screen, a capacitive layer stores electrical charge, which is discharged to the user upon contact with the touch screen, causing a decrease in the charge of the capacitive layer. The decrease is measured, and the contacted location coordinates determined. In a surface acoustic wave touch screen, an acoustic wave is transmitted through the screen, and the acoustic wave is disturbed by user contact. A receiving transducer detects the user contact instance and determines the contacted location coordinates.

**[0195]** The term "web television" is original television content produced for broadcast via the World Wide Web. Some major distributors of web television are YouTube, Myspace, Newgrounds, Blip.tv, and Crackle.

**[0196]** The terms "instant message" and "instant messaging" refer to a form of real-time text communication between two or more people, typically based on typed text.

**[0197]** The term "internet search engine" refers to a web search engine designed to search for information on the World Wide Web and FTP servers. The search results are generally presented in a list of results often referred to as SERPS, or "search engine results pages". The information may consist of web pages, images, information and other types of files.

Some search engines also mine data available in databases or open directories. Web search engines work by storing information about many web pages, which they retrieve from the html itself. These pages are retrieved by a Web crawler (sometimes also known as a spider) — an automated Web browser which follows every link on the site. The contents of each page are then analyzed to determine how it should be indexed (for example, words are extracted from the titles, headings, or special fields called meta tags). Data about web pages are stored in an index database for use in later queries. Some search engines, such as Google™, store all or part of the source page (referred to as a cache) as well as information about the web pages, whereas others, such as AltaVista™, store every word of every page they find.

**[0198]** The terms "online community", "e-community", or "virtual community" mean a group of people that primarily interact via a computer network, rather than face to face, for social, professional, educational or other purposes. The interaction can use a variety of media formats, including wikis, blogs, chat rooms, Internet forums, instant messaging, email, and other forms of electronic media. Many media formats are used in social software separately or in combination, including text-based chatrooms and forums that use voice, video text or avatars.

**[0199]** The term "remote control" refers to a component of an electronics device, most commonly a television set, DVD player and/or home theater system for operating the device wirelessly, typically from a short line-of-sight distance. Remote control normally uses infrared and/or radio frequency (RF) signaling and can include WiFi, wireless USB, Bluetooth™ connectivity, motion sensor enabled capabilities and/or voice control. A touchscreen remote control is a handheld remote control device which uses a touchscreen user interface to replace most of the hard, built-in physical buttons used in normal remote control devices.

**[0200]** The term "satellite TV" refers to television programming delivered by the means of communications satellites and received by an outdoor antenna, usually a parabolic reflector generally referred to as a satellite dish, and as far as household usage is concerned, a satellite receiver either in the form of an external set-top box or a satellite tuner module built into a TV set.

**[0201]** The term "social network service" is a service provider that builds online communities of people, who share interests and/or activities, or who are interested in exploring the interests and activities of others. Most social network services are web-based

and provide a variety of ways for users to interact, such as e-mail and instant messaging services.

**[0202]** The term "social network" refers to a web-based social network.

**[0203]** The term "gesture" refers to a user action that expresses an intended idea, action, meaning, result, and/or outcome. The user action can include manipulating a device (e.g., opening or closing a device, changing a device orientation, moving a trackball or wheel, etc.), movement of a body part in relation to the device, movement of an implement or tool in relation to the device, audio inputs, etc. A gesture may be made on a device (such as on the screen) or with the device to interact with the device.

**[0204]** The term "gesture capture" refers to a sense or otherwise a detection of an instance and/or type of user gesture. The gesture capture can occur in one or more areas of the screen. A gesture region can be on the display, where it may be referred to as a touch sensitive display or off the display where it may be referred to as a gesture capture area.

**[0205]** The term "electronic address" refers to any contactable address, including a telephone number, instant message handle, e-mail address, Universal Resource Locator (URL), Universal Resource Identifier (URI), Address of Record (AOR), electronic alias in a database, like addresses, and combinations thereof.

**[0206]** It shall be understood that the term "means," as used herein, shall be given its broadest possible interpretation in accordance with 35 U.S.C., Section 112(f). Accordingly, a claim incorporating the term "means" shall cover all structures, materials, or acts set forth herein, and all of the equivalents thereof. Further, the structures, materials or acts and the equivalents thereof shall include all those described in the summary of the invention, brief description of the drawings, detailed description, abstract, and claims themselves.

**[0207]** The term "social media" can refer to the means of interactions among people in which they create, share, and exchange information and ideas in virtual communities and networks. Embodiments of social media can include a group of Internet-based applications that allow the creation and exchange of content. Furthermore, social media may depend on mobile and web-based technologies to create highly interactive platforms through which individuals and communities share, co-create, discuss, and modify user-generated content. Social media differentiates from traditional/industrial media in many aspects such as quality, reach, frequency, usability, immediacy, and permanence.

**[0208]** The term "social media site" can refer to a social network or social network service.

**[0209]** The term "social media posting" can refer to an item of content or a provider of content on a social media site.

**[0210]** The term "social media poster" can refer to an author of an item of content or a provider of content on a social media site.

**[0211]** The term "social media pile" can refer to a user interface where each social media posters is represented by a thumbnail or other visual indicia. The social media pile can include two or more thumbnails or visual indicia formed into an arrangement that resembles a pile.

**[0212]** The preceding is a simplified summary of the disclosure to provide an understanding of some aspects of the disclosure. This summary is neither an extensive nor exhaustive overview of the disclosure and its various aspects, embodiments, and/or configurations. It is intended neither to identify key or critical elements of the disclosure nor to delineate the scope of the disclosure but to present selected concepts of the disclosure in a simplified form as an introduction to the more detailed description presented below. As will be appreciated, other aspects, embodiments, and/or configurations of the disclosure are possible utilizing, alone or in combination, one or more of the features set forth above or described in detail below.

## BRIEF DESCRIPTION OF THE DRAWINGS

**[0213]** FIG. 1A includes a first view of an embodiment of an environment of an intelligent television;

**[0214]** FIG. 1B includes a second view of an embodiment of an environment of an intelligent television;

**[0215]** FIG. 2A includes a first view of an embodiment of an intelligent television;

**[0216]** FIG. 2B includes a second view of an embodiment of an intelligent television;

**[0217]** FIG. 2C includes a third view of an embodiment of an intelligent television;

**[0218]** FIG. 2D includes a fourth view of an embodiment of an intelligent television;

**[0219]** FIG. 3 is a block diagram of an embodiment of the hardware of an intelligent television;

**[0220]** FIG. 4 is a block diagram of an embodiment of the intelligent television software and/or firmware;

**[0221]** FIG. 5 is a second block diagram of an embodiment of the intelligent television software and/or firmware;

**[0222]** FIG. 6 is a third block diagram of an embodiment of the intelligent television software and/or firmware;

**[0223]** FIG. 7 is a plan view of an embodiment of a handheld remote control;

**[0224]** FIG. 8 is a side view of an embodiment of a remote control;

**[0225]** FIG. 9A is a bottom view of an embodiment of a remote control with a joystick in a neutral position;

**[0226]** FIG. 9B is a bottom view of an embodiment of a remote control with the joystick in a lower position;

**[0227]** FIG. 9C is a bottom view of an embodiment of a remote control with the joystick in an upper position;

**[0228]** FIG. 10 is a plan view of another embodiment of a handheld remote control;

**[0229]** FIG. 11A is a front view of an embodiment of an Intelligent TV screen;

**[0230]** FIG. 11B is a front view of an embodiment of an Intelligent TV screen;

**[0231]** FIG. 11C is a front view of an embodiment of an Intelligent TV screen;

**[0232]** FIG. 12 is a block diagram of an embodiment of a handheld remote control of either FIG. 7 or 10;

**[0233]** FIG. 13 is a block diagram of an embodiment of a content data service;

**[0234]** FIG. 14 is a block diagram of an embodiment of a VOD content database for an Intelligent TV;

**[0235]** FIG. 15 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0236]** FIG. 16 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0237]** FIG. 17 is a view of an embodiment of a user interface for an Intelligent TV;

**[0238]** FIG. 18 is a view of an embodiment of a user interface for an Intelligent TV;

**[0238.1]** FIG.19 is a view of an embodiment of a user interface for an Intelligent TV;

**[0239]** FIG. 20 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0240]** FIG. 21 is a view of an embodiment of a user interface for an Intelligent TV;

**[0241]** FIG. 22 is a view of an embodiment of a user interface for an Intelligent TV;

**[0242]** FIG. 23 is a view of an embodiment of a user interface for an Intelligent TV;

**[0243]** FIG. 24 is a view of an embodiment of a user interface for an Intelligent TV;

**[0244]** FIG. 25 is a view of an embodiment of a user interface for an Intelligent TV;

**[0245]** FIG. 26 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0246]** FIG. 27A is a view of an embodiment of a user interface for an Intelligent TV;

**[0247]** FIG. 27B is a view of an embodiment of a user interface for an Intelligent TV;

**[0248]** FIG. 27C is a view of an embodiment of a user interface for an Intelligent TV;

**[0249]** FIG. 28 is a view of an embodiment of a user interface for an Intelligent TV;

**[0250]** FIG. 29 is a view of an embodiment of a user interface for an Intelligent TV;

**[0251]** FIG. 30 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0252]** FIG. 31 is a view of an embodiment of a user interface for an Intelligent TV;

**[0253]** FIG. 32 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0254]** FIG. 33 is a view of an embodiment of a user interface for an Intelligent TV;

**[0255]** FIG. 34 is a view of an embodiment of a user interface for an Intelligent TV;

**[0256]** FIG. 35 is a view of an embodiment of a user interface for an Intelligent TV;

**[0257]** FIG. 36 is a view of an embodiment of a user interface for an Intelligent TV;

**[0258]** FIG. 37 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV;

**[0259]** FIG. 38 is a view of an embodiment of a user interface for an Intelligent TV; and

**[0260]** FIG. 39 is a flowchart view of an embodiment of a method for providing VOD in an Intelligent TV.

**[0261]** In the appended figures, similar components and/or features may have the same reference label. Further, various components of the same type may be distinguished by following the reference label by a letter that distinguishes among the similar components. If only the first reference label is used in the specification, the description is applicable to any one of the similar components having the same first reference label irrespective of the second reference label.

## DETAILED DESCRIPTION

**[0262]** Presented herein are embodiments of a device. The device can be a network-enabled telecommunications device, such as a television, an electronic visual display device, or other smart device. The device can include one or more screens, or sections of a screen, that are configured to receive and present information from a number of sources. Further, the device can receive user input in unique ways. The overall design and functionality of the device provides for an enhanced user experience making the device more useful and more efficient.

**[0263]** Intelligent Television (TV) Environment:

**[0264]** Referring to Figs. 1A and 1B, an Intelligent TV, or device, 100 is shown. It is anticipated that the Intelligent TV 100 may be used for entertainment, business applications, social interaction, content creation and/or consumption, and to organize and control one or more other devices that are in communication with the Intelligent TV 100. As can be appreciated, the Intelligent TV 100 can be used to enhance the user interactive experience whether at home or at work.

**[0265]** In some embodiments, the Intelligent TV 100 may be configured to receive and understand a variety of user and/or device inputs. For example, a user may interface with the Intelligent TV 100 via one or more physical or electrical controls, such as buttons, switches, touch sensitive screens/regions (e.g., capacitive touch, resistive touch, etc.), and/or other controls associated with the Intelligent TV 100. In some cases, the Intelligent TV 100 may include the one or more interactive controls. Additionally or alternatively, the one or more controls may be associated with a remote control. The remote control may communicate with the Intelligent TV 100 via wired and/or wireless signals. As can be appreciated, the remote control may operate via radio frequency (RF), infrared (IR), and/or a specific wireless communications protocol (e.g., Bluetooth™, Wi-Fi, etc.). In some cases, the controls, whether physical or electrical, may be configured (e.g., programmed) to suit a user's preferences.

**[0266]** Additionally or alternatively, smart phones, tablets, computers, laptops, netbooks, and other smart devices may be used to control the Intelligent TV 100. For example, control of the Intelligent TV 100 may be achieved via an application running on a smart device. The application may be configured to present a user with various Intelligent TV 100 controls in an intuitive user interface (UI) on a screen associated with the device 100. The screen may be a touch sensitive, or touch screen, display. Selections input by a user via the UI may be configured to control the Intelligent TV 100 by the application accessing one or more communication features associated with the smart device.

**[0267]** It is anticipated that the Intelligent TV 100 can receive input via various input devices including, but in no way limited to, video, audio, radio, light, tactile, and combinations thereof. Among other things, these input devices may be configured to allow the Intelligent TV 100 to see, recognize, and react to user gestures. For instance, a user may talk to the Intelligent TV 100 in a conversational manner. The Intelligent TV 100 may hear and understand voice commands in a manner similar to a smart device's intelligent personal assistant and voice-controlled navigator application (e.g., Apple's Siri, Android's Skyvi, Robin, Iris, and other applications).

[0268] The Intelligent TV 100 may also be a communications device which can establish network connections 104 through many alternate means, including wired 108 or wireless 112 means, over cellular networks 116 to connect via cellular base antenna 142 to telephone networks operated by telephone company 146, and by using a telephone line 120 to connect to telephone networks operated by telephone company 146. These connections 104 enable the Intelligent TV 100 to access one or more communication networks 132. The communication networks may comprise any type of known communication medium or collection of communication media and may use any type of protocols to transport messages or signals between endpoints. The communication networks may include wired and/or wireless communication technologies. The Internet is an example of a communication network 132 that constitutes an Internet Protocol (IP) network consisting of many computers, computing networks, and other communication devices located all over the world, which are connected through many telephone systems and other means.

[0269] Other examples of the communication network 132 include, without limitation, a standard Plain Old Telephone System (POTS), an Integrated Services Digital Network (ISDN), the Public Switched Telephone Network (PSTN), a Local Area Network (LAN), a Wide Area Network (WAN), a cellular network, and any other type of packet-switched or circuit-switched network known in the art. In addition, it can be appreciated that the communication network 132 need not be limited to any one network type, and instead may be comprised of a number of different networks and/or network types.

[0270] In some embodiments, the Intelligent TV 100 may be equipped with multiple communication means. The multiple communication means may allow the Intelligent TV 100 to communicate across Local Area Networks (LANs) 124, wireless local area networks (WLANs) 128, and other networks 132. The networks 132 may be connected in a redundant manner to ensure network access. In other words, if one connection is interrupted, the Intelligent TV 100 can use an alternate communications path to reestablish and/or maintain the network connection 104. Among other things, the Intelligent TV 100 may use these network connections 104 to send and receive information, interact with an electronic program guide (EPG) 136, receive software updates 140, contact customer service 144 (e.g., to receive help or service, etc.), and/or access remotely stored digital media libraries 148. In addition, these connections can allow the Intelligent TV 100 to make phone calls, send and/or receive email messages, send and/or receive text messages (such as email and instant messages), surf the Internet using an internet search engine, post blogs by a blogging service, and connect/interact with social media sites and/or an online community (e.g., Facebook™,

Twitter™, LinkedIn™, Pinterest™, Google+™, MySpace™, and the like) maintained by a social network service. In combination with other components of the Intelligent TV 100 described in more detail below, these network connections 104 also enable the Intelligent TV 100 to conduct video teleconferences, electronic meetings, and other communications. The Intelligent TV 100 may capture and store images and sound, using associated cameras, microphones, and other sensors. Additionally or alternatively, the Intelligent TV 100 may create and save screen shots of media, images, and data displayed on a screen associated with the Intelligent TV 100.

[0271] Further, as shown in Fig. 1B, the Intelligent TV 100 can interact with other electronic devices 168 by either by the wired 108 and/or wireless 112 connections. As described herein, components of the Intelligent TV 100 allow the device 100 to be connected to devices 168 including, but not limited to, DVD players 168a, BluRay players 168b, portable digital media devices 168c, smart phones 168d, tablet devices 168e, personal computers 168f, external cable boxes 168g, keyboards 168h, pointing devices 168i, printers 168j, game controllers and/or game pads 168k, satellite dishes 168l, external display devices 168m, and other universal serial bus (USB), local area network (LAN), Bluetooth™, or high-definition multimedia interface (HDMI) compliant devices, and/or wireless devices. When connected to an external cable box 168g or satellite dish 168l, the Intelligent TV 100 can access additional media content. Also, as further described below, the Intelligent TV 100 is capable of receiving digital and/or analog signals broadcast by TV stations. The Intelligent TV 100 can be configured as one or more of a standard-definition television, enhanced television, and high-definition television. It may operate as one or more of cable, Internet, Internet Protocol, satellite, web, and/or smart television. The Intelligent TV 100 may also be used to control the operation of, and may interface with, other smart components such as security systems 172, door/gate controllers 176, remote video cameras 180, lighting systems 184, thermostats 188, refrigerators 192, and other appliances.

**[0272]** Intelligent TV:

[0273] Figs. 2A-2D illustrate components of the Intelligent TV 100. In general, as shown by Fig. 2A, the Intelligent TV 100 can be supported by a removable base or stand 204 that is attached to a frame 208. The frame 208 surrounds edges of a display screen 212, leaving a front surface of the display screen 212 uncovered. The display screen 212 may comprise a Liquid Crystal Display (LCD) screen, a plasma screen, Light Emitting Diode (LED) screen, or other screen types. In embodiments, the entire front surface of the screen 212 may be

touch sensitive and capable of receiving input by the user touching the front surface of the screen 212.

**[0274]** The Intelligent TV 100 may include integrated speakers 216 and at least one microphone 220. A first area of the frame 208 may comprise a horizontal gesture capture region 224 and second areas comprise vertical gesture capture regions 228. The gesture capture regions 224, 228 may comprise areas or regions that are capable of receiving input by recognizing gestures made by the user, and in some examples, without the need for the user to actually touch the screen 212 surface of the Intelligent TV 100. However, the gesture capture regions 224, 228 may not include pixels that can perform a display function or capability.

**[0275]** One or more image capture devices 232, such as a camera, can be included for capturing still and/or video images. The image capture device 232 can include or be associated with additional elements, such as a flash or other light source 236 and a range finding device 240 to assist focusing of the image capture device. In addition, the microphone 220, gesture capture regions 224, 228, image capture devices 232, and the range finding device 240 may be used by the Intelligent TV 100 to recognize individual users. Additionally or alternatively, the Intelligent TV 100 may learn and remember preferences associated with the individual users. In some embodiments, the learning and remembering (i.e., identifying and recalling stored information) may be associated with the recognition of a user.

**[0276]** An IR transmitter and receiver 244 may also be provided to connect the Intelligent TV 100 with a remote control device (not shown) or other IR devices. Additionally or alternatively, the remote control device may transmit wireless signals via RF, light, and/or a means other than IR. Also shown in Fig. 2A is an audio jack 248, which may be hidden behind a panel that is hinged or removable. The audio jack 248 accommodates a tip, ring, sleeve (TRS) connector, for example, to allow the user to utilize headphones, a headset, or other external audio equipment.

**[0277]** The Intelligent TV 100 can also include a number of buttons 252. For example, Fig. 2A illustrates the buttons 252 on the top of the Intelligent TV 100, although the buttons could be placed at other locations. As shown, the Intelligent TV 100 includes six buttons 252a-f, which can be configured for specific inputs. For example, the first button 252a may be configured as an on/off button used to control overall system power to the Intelligent TV 100. The buttons 252 may be configured to, in combination or alone, control a number of aspects of the Intelligent TV 100. Some non-limiting examples include, but are not limited to,

overall system volume, brightness, the image capture device, the microphone, and initiation/termination of a video conference. Instead of separate buttons, two of the buttons may be combined into a rocker button. This rocker button arrangement may be useful in situations where the buttons are configured to control features such as volume or brightness. In some embodiments, one or more of the buttons 252 are capable of supporting different user commands. By way of example, a normal press has a duration commonly of less than about 1 second and resembles a quick input. A medium press has a duration commonly of 1 second or more but less than about 12 seconds. A long press has a duration commonly of about 12 seconds or more. The function of the buttons is normally specific to the application that is active on the Intelligent TV 100. In the video conference application for instance and depending on the particular button, a normal, medium, or long press can mean end the video conference, increase or decrease the volume, increase a rate speed associated with a response to an input, and toggle microphone mute. Depending on the particular button, a normal, medium, or long press can also control the image capture device 232 to increase zoom, decrease zoom, take a photograph, or record video.

**[0278]** In support of communications functions or capabilities, the Intelligent TV 100 can include one or more shared or dedicated antennae 256 and wired broadband connections 260 as shown in Fig. 2B. The antennae 256 also enable the Intelligent TV 100 to receive digital and/or analog broadcast TV channels. The wired broadband connections 260 are, for example, a Digital Subscriber Line (DSL), an optical line, an Ethernet port, an IEEE 1394 interface, or other interfaces. The Intelligent TV 100 also has a telephone line jack 262 to further provide communications capability.

**[0279]** In addition to the removable base 204, the Intelligent TV 100 may include hardware and mounting points 264 on a rear surface to facilitate mounting the Intelligent TV 100 to a surface, such as a wall. In one non-limiting example, the Intelligent TV 100 may incorporate at least one Video Equipment Standards Association (VESA) mounting interface for attaching the device 100 to the surface.

**[0280]** As shown in Fig. 2C, the Intelligent TV 100 may include docking interfaces or ports 268. The docking ports 268 may include proprietary or universal ports to support the interconnection of the Intelligent TV 100 to other devices or components, which may or may not include additional or different capabilities from those integral to the Intelligent TV 100. In addition to supporting an exchange of communication signals between the Intelligent TV 100 and a connected device or component, the docking ports 268 can support the supply of power to the connected device or component. The docking ports 268 can also comprise an

intelligent element that comprises a docking module for controlling communications or other interactions between the Intelligent TV 100 and the connected device or component.

**[0281]** The Intelligent TV 100 also includes a number of card slots 272 and network or peripheral interface ports 276. The card slots 272 may accommodate different types of cards including subscriber identity modules (SIM), secure digital (SD) cards, MiniSD cards, flash memory cards, and other cards. Ports 276 in embodiments may include input/output (I/O) ports, such as universal serial bus (USB) ports, parallel ports, game ports, and high-definition multimedia interface (HDMI) connectors.

**[0282]** An audio/video (A/V) I/O module 280 can be included to provide audio to an interconnected speaker or other device, and to receive audio input from a connected microphone or other device. As an example, the audio input/output interface 280 may comprise an associated amplifier and analog-to-digital converter.

**[0283]** Hardware Features:

**[0284]** Fig. 3 illustrates components of a Intelligent TV 100 in accordance with embodiments of the present disclosure. In general, the Intelligent TV 100 includes a primary screen 304. Screen 304 can be a touch sensitive screen and can include different operative areas.

**[0285]** For example, a first operative area, within the screen 304, may comprise a display 310. In some embodiments, the display 310 may be touch sensitive. In general, the display 310 may comprise a full color, display.

**[0286]** A second area within the screen 304 may comprise a gesture capture region 320. The gesture capture region 320 may comprise an area or region that is outside of the display 310 area, and that is capable of receiving input, for example in the form of gestures provided by a user. However, the gesture capture region 320 does not include pixels that can perform a display function or capability.

**[0287]** A third region of the screen 304 may comprise a configurable area 312. The configurable area 312 is capable of receiving input and has display or limited display capabilities. In embodiments, the configurable area 312 may present different input options to the user. For example, the configurable area 312 may display buttons or other relatable items. Moreover, the identity of displayed buttons, or whether any buttons are displayed at all within the configurable area 312 of a screen 304, may be determined from the context in which the Intelligent TV 100 is used and/or operated.

**[0288]** In an exemplary touch sensitive screen 304 embodiment, the touch sensitive screen 304 comprises a liquid crystal display extending across at least those regions of the touch

sensitive screen 304 that are capable of providing visual output to a user, and a capacitive input matrix over those regions of the touch sensitive screen 304 that are capable of receiving input from the user.

**[0289]** One or more display controllers 316 may be provided for controlling the operation of the screen 304. The display controller 316 may control the operation of the touch sensitive screen 304, including input (touch sensing) and output (display) functions. The display controller 316 may also control the operation of the screen 304 and may interface with other inputs, such as infrared and/or radio input signals (e.g., door/gate controllers, alarm system components, etc.). In accordance with still other embodiments, the functions of a display controller 316 may be incorporated into other components, such as a processor 364.

**[0290]** The processor 364 may comprise a general purpose programmable processor or controller for executing application programming or instructions. In accordance with at least some embodiments, the processor 364 may include multiple processor cores, and/or implement multiple virtual processors. In accordance with still other embodiments, the processor 364 may include multiple physical processors. As a particular example, the processor 364 may comprise a specially configured application specific integrated circuit (ASIC) or other integrated circuit, a digital signal processor, a controller, a hardwired electronic or logic circuit, a programmable logic device or gate array, a special purpose computer, or the like. The processor 364 generally functions to run programming code or instructions implementing various functions of the Intelligent TV 100.

**[0291]** In support of connectivity functions or capabilities, the Intelligent TV 100 can include a module for encoding/decoding and/or compression/decompression 366 for receiving and managing digital television information. Encoding/decoding compression/decompression module 366 enables decompression and/or decoding of analog and/or digital information dispatched by a public television chain or in a private television network and received across antenna 324, I/O module 348, wireless connectivity module 328, and/or other wireless communications module 332. The television information may be sent to screen 304 and/or attached speakers receiving analog or digital reception signals. Any encoding/decoding and compression/decompression is performable on the basis of various formats (e.g., audio, video, and data). Encrypting module 368 is in communication with encoding/decoding compression/decompression module 366 and enables the confidentiality of all the data received or transmitted by the user or supplier.

**[0292]** In support of communications functions or capabilities, the Intelligent TV 100 can include a wireless connectivity module 328. As examples, the wireless connectivity module

328 can comprise a GSM, CDMA, FDMA and/or analog cellular telephony transceiver capable of supporting voice, multimedia and/or data transfers over a cellular network. Alternatively or in addition, the Intelligent TV 100 can include an additional or other wireless communications module 332. As examples, the other wireless communications module 332 can comprise a Wi-Fi, Blutooth™, WiMax, infrared, or other wireless communications link. The wireless connectivity module 328 and the other wireless communications module 332 can each be associated with a shared or a dedicated antenna 324 and a shared or dedicated I/O module 348.

**[0293]** An input/output module 348 and associated ports may be included to support communications over wired networks or links, for example with other communication devices, server devices, and/or peripheral devices. Examples of an input/output module 348 include an Ethernet port, a Universal Serial Bus (USB) port, Thunderbolt™ or Light Peak interface, Institute of Electrical and Electronics Engineers (IEEE) 1394 port, or other interface.

**[0294]** An audio input/output interface/device(s) 344 can be included to provide analog audio to an interconnected speaker or other device, and to receive analog audio input from a connected microphone or other device. As an example, the audio input/output interface/device(s) 344 may comprise an associated amplifier and analog-to-digital converter. Alternatively or in addition, the Intelligent TV 100 can include an integrated audio input/output device 356 and/or an audio jack for interconnecting an external speaker or microphone. For example, an integrated speaker and an integrated microphone can be provided, to support near talk or speaker phone operations.

**[0295]** A port interface 352 may be included. The port interface 352 may include proprietary or universal ports to support the interconnection of the device 100 to other devices or components, such as a dock, which may or may not include additional or different capabilities from those integral to the device 100. In addition to supporting an exchange of communication signals between the device 100 and another device or component, the docking port 136 and/or port interface 352 can support the supply of power to or from the device 100. The port interface 352 also comprises an intelligent element that comprises a docking module for controlling communications or other interactions between the Intelligent TV 100 and a connected device or component. The docking module may interface with software applications that allow for the remote control of other devices or components (e.g., media centers, media players, and computer systems).

**[0296]** An Intelligent TV 100 may also include memory 308 for use in connection with the execution of application programming or instructions by the processor 364, and for the temporary or long term storage of program instructions and/or data. As examples, the memory 308 may comprise RAM, DRAM, SDRAM, or other solid state memory. Alternatively or in addition, data storage 314 may be provided. Like the memory 308, the data storage 314 may comprise a solid state memory device or devices. Alternatively or in addition, the data storage 314 may comprise a hard disk drive or other random access memory.

**[0297]** Hardware buttons 358 can be included for example for use in connection with certain control operations. One or more image capture interfaces/devices 340, such as a camera, can be included for capturing still and/or video images. Alternatively or in addition, an image capture interface/device 340 can include a scanner, code reader, or motion sensor. An image capture interface/device 340 can include or be associated with additional elements, such as a flash or other light source. The image capture interfaces/devices 340 may interface with a user ID module 350 that assists in identifying users of the Intelligent TV 100.

**[0298]** The Intelligent TV 100 can also include a global positioning system (GPS) receiver 336. In accordance with embodiments of the present invention, the GPS receiver 336 may further comprise a GPS module that is capable of providing absolute location information to other components of the Intelligent TV 100. As will be appreciated, other satellite-positioning system receivers can be used in lieu of or in addition to GPS.

**[0299]** Power can be supplied to the components of the Intelligent TV 100 from a power source and/or power control module 360. The power control module 360 can, for example, include a battery, an AC-to-DC converter, power control logic, and/or ports for interconnecting the Intelligent TV 100 to an external source of power.

**[0300]** Communication between components of the Intelligent TV 100 is provided by bus 322. Bus 322 may comprise one or more physical buses for control, addressing, and/or data transmission. Bus 322 may be parallel, serial, a hybrid thereof, or other technology.

**[0301]** Firmware and Software:

**[0302]** An embodiment of the software system components and modules 400 is shown in Fig. 4. The software system 400 may comprise one or more layers including, but not limited to, an operating system kernel 404, one or more libraries 408, an application framework 412, and one or more applications 416. The one or more layers 404-416 can communicate with each other to perform functions for the Intelligent TV 100.

**[0303]** An operating system (OS) kernel 404 contains the primary functions that allow the software to interact with hardware associated with the Intelligent TV 100. Kernel 404 can include a collection of software that manages the computer hardware resources and provides services for other computer programs or software code. The operating system kernel 404 is the main component of the operating system and acts as an intermediary between the applications and data processing done with the hardware components. Part of the operating system kernel 404 can include one or more device drivers 420. A device driver 420 can be any code within the operating system that helps operate or control a device or hardware attached to or associated with the Intelligent TV. The driver 420 can include code for operating video, audio, and/or other multimedia components of the Intelligent TV 100. Examples of drivers include display, camera, flash, binder (IPC), keypad, WiFi, and audio drivers.

**[0304]** Library 408 can contain code or other components that may be accessed and implemented during the operation of the software system 400. The library 408 may contain one or more of, but is not limited to, an operating system runtime library 424, a TV services hardware abstraction layer (HAL) library 428, and/or a data service library 432. The OS runtime library 424 may contain the code required by the operating system kernel 404 or other operating system functions to be executed during the runtime of the software system 400. The library can include the code that is initiated during the running of the software system 400.

**[0305]** The TV services hardware abstraction layer library 428 can include code required by TV services either executed in the application framework 412 or an application 416. The TV services HAL library 428 is specific to the Intelligent TV 100 operations that control different functions of the Intelligent TV. The TV service HAL library 428 can also be formed from other types of application languages or embodiments of different types of code or formats for code beyond the hardware abstraction layer.

**[0306]** The data services library 432 can include the one or more components or codes to implement components for the data services function. The data services function can be implemented in the application framework 412 and/or applications layer 416. An embodiment of a function of the data services and the type of components that may be included is shown in Fig. 6.

**[0307]** The application framework 412 can include a general abstraction for providing functionality that can be selected by one or more applications 416 to provide specific application functions or software for those applications. Thus, the framework 412 can

include one or more different services, or other applications, that can be accessed by the applications 416 to provide general functions across two or more applications. Such functions include, for example, management of one or more of windows or panels, surfaces, activities, content, and resources, The application framework 412 can include one or more, but is not limited to, TV services 434, TV services framework 440, TV resources 444, and user interface components 448.

**[0308]** The TV services framework 440 can provide an additional abstraction for different TV services. TV services framework 440 allows for the general access and function of services that are associated with the TV functionality. The TV services 436 are general services provided within the TV services framework 440 that can be accessed by applications in the applications layer 416. The TV resources 444 provide code for accessing TV resources 444 including any type of storage, video, audio, or other functionality provided with the Intelligent TV 100. The TV resources 444, TV services 436, and TV services framework 440 provide for the different implementations of TV functionality that may occur with the Intelligent TV 100.

**[0309]** One or more user interface components 448 can provide general components for display of the Intelligent TV 100. The user interface components 448 might be general components that may be accessed by different applications provided in the application framework 412. The user interface components 448 may be accessed to provide for panels and silos as described in conjunction with Fig. 5.

**[0310]** The applications layer 416 can both contain and execute applications associated with the Intelligent TV 100. Applications layer 416 may include one or more of, but is not limited to, a live TV application 452, a VOD application 456, a media center application 460, an application center application 464, and a user interface application 468. The live TV application 452 can provide live TV over different signal sources. For example, the live TV application 452 can provide TV from input from cable television, over air broadcasts, from satellite services, or other types of live TV services. Live TV application 452 may then present the multimedia presentation or video and audio presentation of the live television signal over the display of the Intelligent TV 100.

**[0311]** The VOD application 456 can provide for video from different storage sources. Unlike Live TV application 452, VOD 456 provides for display of videos that are accessed from some memory source. The sources of the VOD can be associated with users or with the Intelligent TV or some other type of service. For example, the VOD 456 may be provided

from an iTunes library stored in a cloud, from a local disc storage that contains stored video programs, or from some other source.

**[0312]** The media center application 460 can provide applications for different types of media presentation. For example, the media center 460 can provide for displaying pictures or audio that is different from, but still accessible by the user and different from live TV or VOD. The media center 460 allows for the access of different sources to obtain the media in the display of such media on the Intelligent TV 100.

**[0313]** The application center 464 allows for the provision, storage and use of applications. An application can be a game, a productivity application, or some other application generally associated with computer systems or other devices, but may be operated within the Intelligent TV. An application center 464 may obtain these applications from different sources, store them locally and then execute those types of applications for the user on the Intelligent TV 100.

**[0314]** User interface application 468 provides for the specific user interfaces associated with the Intelligent TV 100. These user interfaces can include the silos and panels that are described in Fig. 5. An embodiment of the user interface software 500 is shown in Fig. 5. In one non-limiting example the application framework 412 contains one or more code components which help control the user interface events while one or more applications in the applications layer 416 affects the user interface use for the Intelligent TV 100. The application framework 412 can include a silo transition controller 504 and/or an input event dispatcher 508. There may be more or fewer code components in the application framework 412 than those shown in Fig. 5. The silo transition controller 504 contains the code and language that manages the transitions between one or more silos. A silo can be a vertical user interface feature on the Intelligent TV that contains information for user. The transition controller 504 can manage the changes between two silos when an event occurs in the user interface. The input event dispatcher 508 can receive user interface events that may be received from the operating system and provided to the input event dispatcher 508. These events can include selections of buttons on a remote control or on the TV or other types of user interface inputs. The input event dispatcher 508 may then send these events to a silo manager 532 or panel manager 536 depending on the type of the event. The silo transition controller 504 can interface with the silo manager 532 to affect changes in the silos.

**[0315]** The applications layer 416 can include a user interface application 468 and/or a silo application 512. The applications layer 416 can include more or fewer user interface applications as necessary to control the user interface of the Intelligent TV 100 than those

shown in Fig. 5. The user interface application 468 can include a silo manager 532, a panel manager 536, and one or more types of panels 516-528. The silo manager 532 manages the display and/or features of silos. The silo manager 532 can receive or send information from the silo transition controller 504 or the input event dispatcher 508 to change the silos displayed and/or to determine types of input received in the silos.

**[0316]** A panel manager 536 is operable to display panels in the user interface to manage transitions between those panels or to affect user interface inputs received in the panel. The panel manager 536 may thus be in communication with different user interface panels such as a global panel 516, a volume panel 520, a settings panel 524, and/or a notification panel 528. The panel manager 536 can display these types of panels depending on the inputs received from the input event dispatcher 508. The global panel 516 may include information that is associated with the home screen or top level hierarchal information for the user. A volume panel 520 may display information about an audio volume control or other settings for volume. A settings panel 524 can include information displayed about the settings of the audio or video, or other settable characteristics of the Intelligent TV 100. A notification panel 528 can provide information about notifications to a user. These notifications can be associated with information, such as, VOD displays, favorites, currently provided programs, or other information. Notifications can be associated with the media or with some type of setting, or operation or the Intelligent TV 100. The panel manager 536 may be in communication with the panel controller 552 of the silo application 512.

**[0317]** The panel controller 552 may operate to control portions of the panels of the types described previously. Thus, the panel controller 552 may be in communication with a top panel application 540, an application panel 544, and/or bottom panel 548. These types of panels may be differently displayed in the user interface of the Intelligent TV 100. The panel control thus may be based on the configuration of the system or the type of display being used currently, put the types of panels 516-528 into a certain display orientation governed by the top panel application 540, application panel 544, or bottom panel application 548.

**[0318]** An embodiment of the data service 432 and the operation of the data management is shown in Fig. 6. The data management 600 can include one or more code components that are associated with different types of data. For example, there may be code components within the data service 432 that execute and are associated with VOD, the electronic program guide, or media data. There may be more or fewer types of data service 432 components than those shown in Fig. 6. Each of the different types of data may include a data model 604-612. The data models govern what information is to be stored and how that information will be

stored by the data service. Thus, the data model can govern regardless of where the data comes from, how the data will be received or managed within the Intelligent TV system. Thus, the data model 604, 608, and/or 612, can provide a translation ability or affect the ability to translate data from one form to another to be used by the Intelligent TV 100.

**[0319]** The different types of data services (VOD, electronic programming guide, media) each have a data subservice 620, 624, and/or 628 that is in communication with one or more internal and/or external content providers 616. The data subservices 620, 624, and 628 that communicate with the content providers 616 to obtain data that may then be stored in databases 632, 636, and 640. The subservices 620, 624, and 628 may communicate with and initiate or enable one or more source plug-ins 644, 648, and 652 to communicate with the content provider. For each content provider 616, there may be a different source plug-in 644, 648, and 652. Thus, if there is more than one source of content for the data, each of the data subservices 620, 624, and 628 may determine and then enable or initiate a different source plug-in 644, 648, and/or 652. The content providers 616 may also provide information to a resource arbitrator 656 and/or thumbnail cache manager 660. The resource arbitrator 656 may operate to communicate with resources 664 that are external to the data service 432. Thus, the resource arbitrator 656 may communicate with cloud based storage, network based storage, or other types of external storage in the resources 664. This information may then be provided through the content provider module 616 to the data subservices 620, 624, 628. Likewise, a thumbnail cache manager 660 may obtain thumbnail information from one of the data subservices 620, 624, 628 and store that information in the thumbnails database 668. Further, the thumbnail cache manager 660 may extract or retrieve that information from the thumbnails database 668 to provide to one of the data subservices 620, 624, 628.

**[0320]** An exemplary content aggregation architecture 1300 is shown in Fig. 13. The architecture can include a user interface layer 1304 and a content aggregation layer 1308. The user interface layer 1304 may include a TV application 1312, media player 1316, and application(s) 1320. The TV application 1312 enables the viewer to view channels received via an appropriate transmission medium, such as cable, satellite, and/or the Internet. The media player 1316 views other types of media received via an appropriate transmission medium, such as the Internet. The application(s) 1320 include other TV-related (pre-installed) applications, such as content viewing, content searching, device viewing, and setup algorithms, and coordinates with the media player 1316 to provide information to the viewer.

**[0321]** The content source layer 1308 includes, as data services, a content source service 1328, a content aggregation service 1332 and a content presentation service 1336. The

content source service 1328 can manage content source investigators, including local and/or network file system(s), digital network device manager (which discovers handheld and non-handheld devices (e.g., digital media servers, players, renderers, controllers, printers, uploaders, downloaders, network connectivity functions, and interoperability units) by known techniques, such as a multicast universal plug and play or UPnP discovery techniques, and, for each discovered device, retrieves, parses, and encodes device descriptors, notifies the content source service of the newly discovered device, and provides information, such as an index, on previously discovered devices), Internet Protocol Television or IPTV, digital television or DTV (including high definition and enhanced TV), third party services (such as those referenced above), and applications (such as Android applications).

**[0322]** Content source investigators can track content sources and are typically configured as binaries. The content source service 1328 starts content source investigators and maintains open and persistent channels for communications. The communications include query or command and response pairs. The content aggregation service 1332 can manage content metadata fetchers, such as for video, audio, and/or picture metadata. The content presentation service 1336 may provide interfaces to the content index 1340, such as an Android application interface and digital device interfaces.

**[0323]** The content source service 1328 can send and receive communications 1344 to and from the content aggregation service 1332. The communications can include notifications regarding new and removed digital devices and/or content and search queries and results. The content aggregation service 1332 can send and receive communications 1348 to and from the content presentation service 1336 including device and/or content lookup notifications, content-of-interest advisories and notifications, and search queries and results.

**[0324]** When a search is performed, particularly when the user is searching or browsing content, a user request may be received from the user interface layer 1300, by the content presentation service 1336, which responsively opens a socket and sends the request to the content aggregation service 1332. The content aggregation service 1332 first returns results from the local database 1340. The local database 1340 includes an index or data model and indexed metadata. The content source service 1328 further issues search and browse requests for all content source investigators and other data management systems. The results are forwarded to the content aggregation service 1332, which updates the database 1340 to reflect the further search results and provides the original content aggregation database search results and the data updates, reflecting the additional content source service search results, over the previously opened socket to the content presentation service 1336. The content presentation

service 1336 then provides the results to one or more components in the user interface layer 1300 for presentation to the viewer. When the search session is over (e.g., the search session is terminated by the user or by an action associated with user), the user interface layer 1300 disconnects the socket. As shown, media can be provided directly by the content aggregation service 1332 to the media player 1316 for presentation to the user.

**[0325]** Remote Control:

**[0326]** A handheld remote control can be provided to enable user interaction with the Intelligent TV 100. An exemplary handheld remote control is shown in Figs. 7-9. The remote control 700 can include one or more of, but is not limited to, top, side and bottom housings 704, 708, and 712, an (on/off) power button 716, an input source button 720 (to select input source such as Live TV, VOD, media center, application center, high definition multimedia interface or HDMI, component or COMP, audio/Video or A/V, digital or analog television or DTV/ATV, and video graphics array (VGA)), a (volume) mute button 724, a Live TV button 728 (to activate or select the Live TV silo), a VOD (VOD) button 732 (to activate or select the VOD silo), a media center button 736 (to activate or select the media center application or silo, which access various types of media such as music, TV programming, videos, and the like), an application center button 740 (to activate or select the application center application or silo), a global panel button 744, an application panel button 748, a back button 752 (to select a prior user operation or Intelligent TV state and/or navigate up a hierarchy of any displayed image or object(s) (in which case the back button 752 does not navigate within application panels or across application silos), a play button 756 (to play or pause media), a D-pad 760 (which includes north, east, west, and south directional arrows to navigate among displayed images and/or move between levels of an application's or object's hierarchy such as application view navigation, panel navigation, and collection navigation), an OK (or select) button 764 (to select a highlighted displayed image (such as displayed speed control, rewind, forward, play, and pause objects and/or objects on menu bar or in a menu box) and/or navigate down a hierarchy of any displayed image or object(s)), a rocker-type volume-up and volume-down button 768 (to adjust the volume), a menu/guide button 772 (to select for display a menu or guide of programming), a 0-9 (number) button 776 (to display a number pad on the TV screen), a settings button 780 (which launches an application to access current and change TV settings (such as channel settings and settings used to adjust picture and sound effects (e.g., image mode (e.g., standard, playground, game, cinema, concert, and studio), brightness, contrast, saturation, color temperature, energy savings, 3D noise reduction, hue, sharpness, zoom mode (e.g., full screen, standard, smart

zoom, and dot-to-dot), picture position, 3D mode, for picture, and sound retrieval system or SRS TruSurround, sound mode (e.g., standard, live 1, live 2, theatre, music, speech, user equalizer mode, Left/Right speaker balance, auto volume control, Sony/Philips Interconnect Format or S/PDIF (off, auto, pulse code modulation or PCM) for sound) and system settings (such as system (e.g., selected language for graphical user interface, user geographical and/or geopolitical location information, input method, area settings, and sleep time), network (e.g., WiFi, WiFi hotspot, WiFi direct, Point-to-Point Protocol over Ethernet or PPPoE (asymmetric digital subscriber line or ADSL), Ethernet) settings (e.g., enabled and disabled and selected and non-selected) and information (e.g., network information (e.g., electronic address such as Internet Protocol or IP address, subnet mask, gateway, domain name server information, domain name, Media Access Control or MAC address, service set identification or SSID, security information, and password information) and inline status), manage applications (e.g., currently installed applications, currently executing applications, and internal and external computer readable medium usage), and view user information regarding the Intelligent TV 100)), a rocker-type channel-up and channel-down button 784 (to increment or decrement the selected channel), and first, second, third and fourth hotkeys 788, 792, 794, and 796, and/or a moveable joystick 900 on a bottom of the remote control 700. The first, second, third, and fourth hotkeys are generally assigned different colors, which color indexing is depicted as visual indicia on a selected panel to show the currently assigned function, if any, for each hotkey. As can be seen, the actuator layout can provide a highly efficient, satisfactory, and easily usable experience to the end user.

**[0327]** Unlike the functional associations and functions of many of the actuators, those of some of the actuators are not readily apparent. A number of examples will now be discussed by way of illustration.

**[0328]** The media center button 736, when selected, can provide information regarding music, videos, photographs, collections or groupings of music, videos, and/or photographs, and internal and external computational devices (such as personal computers, laptops, tablet computers, wireless phones, removable computer readable media, and the like), which can be grouped in a selected manner (such as favorites, most recently viewed, most watched or viewed, and most recently added). The information can includes previews (which can include selected portions of the media content, duration, file size, date created, date last watched, times watched or viewed, and audio and/or video format information).

**[0329]** The application center button 740, when selected, may provide information regarding pre-installed and downloaded applications. Unlike downloaded applications, pre-

installed applications cannot be removed by the user or manually updated. Exemplary pre-installed applications include web browser, settings control, and content search algorithms. By way of illustration, the application center button 740 can provide a scrollable graphical grid of icons (each icon being associated with an application) currently available in the application center.

**[0330]** The global panel button 744, when selected, can provide the user, via one or more panels or windows, with access to one or more of, but not limited to, silos, notifications, a web browser, system settings, and/or information associated therewith. For example, the global panel button 744 can enable the user to determine what external devices are currently connected to and/or disconnected from the Intelligent TV 100, determine what inputs (e.g., HDMI ports) are currently available for connecting to external devices, determine a connection and/or operational status of a selected external device and/or network (e.g., WiFi connected, Ethernet connected, and offline), assign a custom (or user selected) name to each input source, determine what content is currently being offered on Live TV, on demand, the media center, and/or the application center, access vendor messages and notifications to the user (e.g., system and/or application updates are available), activate the Internet browser, and/or access shortcuts on a displayed shortcut bar to more frequently used and desired applications. Common shortcuts are Internet browser (e.g., Internet search engine), system settings, and notifications. The common types of panels are for information (which is typically information related to a currently displayed image and/or content (e.g., title, date/time, audio/visual indicator, rating, and genre), browse requests, and/or search requests (such as search term field)). Each of the panel types may include a panel navigation bar, detailed information or relevant content to the panel function, operation and/or purpose, and a hotkey bar (defining currently enabled functional associations of hotkeys).

**[0331]** The application panel button 748, when selected, can display an application window or panel. One application panel may be an information panel regarding a selected (pre-installed or previously downloaded) application icon. The information panel can one or more of identify the selected application, provide a description of the functionality (including application developer and/or vendor, version, release, and/or last update date and a category or type of application based on the application's functionality) and user ratings and/or degree of other user downloading of the application (e.g., a star rating assigned based on one or more of the foregoing inputs), provide the option to launch, remove, update, and add to favorites the identified application, and provide a listing of selectable links of other (not yet downloaded) recommended applications that provide similar functionality to the identified

application. The latter listing can, in turn, provide a description of the functionality (including application developer and/or vendor, version, release, and/or last update date and a category or type of application based on the application's functionality) and user ratings and/or degree of other user downloading of the application (e.g., a star rating assigned based on one or more of the foregoing inputs).

**[0332]** The functions of the first, second, third, and fourth hotkeys 788, 792, 794, and 796 can change depending on system state, context, and/or, within a selected screen and/or panel, based on a content or currently selected portion of (or relative cursor position on) the screen. Commonly, a currently assigned function of any of the first, second, third, and fourth hotkeys 788, 792, 794, and 796 depends on a currently accessed silo and/or panel (with which the user is currently interacting within the silo). In other words, a first function of one of the first, second, third, and fourth hotkeys 788, 792, 794, and 796 is activated by the respective hotkey in a first system state while a different second function is activated by the respective hotkey in a different second system state. In another example, a third function of one of the first, second, third, and fourth hotkeys 788, 792, 794, and 796 is activated by the respective hotkey when a user focus (or currently selected cursor position or screen portion) is at a first screen position while a different fourth function is activated by the respective hotkey when a user focus (or currently selected cursor position or screen portion) is at a different second screen position. The first screen position can, for instance, be within an icon while the second screen position is outside of the icon. Hotkey functionality that could be enabled when in the first screen position may be "configure" and "remove" and disabled is "add", and, when in the second position hotkey functionality enabled can be "add" and disabled is "configure" and "remove". Generally, the states of hotkeys can include normal (for enabled actions or functions), disabled (when an action or function is temporarily disabled), pressed (when selected by a user to command an action or function to be performed), and unavailable (when no association between the hotkey and an action or function is currently available). While examples of hotkey functions are discussed below, it is to be understood that these are not intended to be exhaustive or limiting examples.

**[0333]** The first hotkey 788, when selected in a first system state, can enable the user to assign, change, or edit a name of an input source. It is typically enabled only when the input source of HDMI, Comp/YPbPr (e.g., component video cables), video output, and VGA is in focus. When selected in a second system state, the first hotkey 788 can return the user to a top of a scrollable collection of objects, such as application icons.

**[0334]** The second hotkey 792 may show all or less. In other words, the hotkey 792 can allow the user to show all inputs, including the unconnected/undetected ones and to hide the unconnected/undetected inputs, e.g., to expand and collapse the silo/input list. Each input source can have one of two states, namely connected/detected and unconnected/undetected. Some input sources, including Live TV, VOD, media center, and application center are always connected/detected.

**[0335]** The moveable joystick 900 on the bottom of the remote control 700, when manipulated, can cause a displayed image on the Intelligent TV 100 screen to be displaced a proportional amount. In other words, the displayed image is displaced substantially simultaneously with displacement of the joystick 900 within the joystick aperture 904 in the bottom housing 712 of the remote control. As shown in Figs. 9B-C, the joystick 900 moves or slides between forward and reverse positions. Releasing the joystick 900 causes the joystick 900 to return to the center position of Fig. 9A, and the window to move or slide upwardly (when the joystick is released from the joystick position of Fig. 9B) or downwardly (when the joystick is released from the joystick position of Fig. 9C) until it disappears from view as shown in Fig. 11A . The effect on the screen of the Intelligent TV 100 is shown in Figs. 11A-C. In Fig. 11A, video content, such as TV programming, a video, movie, and the like, is being displayed by front surface of the screen 212. In Fig, 11B, the joystick 900 is moved or slid to the upper position of Fig. 9B, and a drop down window or panel 1100 moves or slides down (at the substantially the same rate of joystick 900 movement) at the top of the screen 212. In Fig, 11C, the joystick 900 is moved or slid to the lower position of Fig. 9C, and a drop up window or panel 1100 moves or slides up (at the substantially the same rate of joystick 900 movement) at the bottom of the screen 212. The window 1100 partially covers the video content appearing on the remainder of the screen 212 and/or causes a portion of the screen 212 displaying video content to move and/or compress up or down the height of the window 1100.

**[0336]** The window 1100 can include one or more of information (which is typically information related to a currently displayed image and/or content (e.g., panel navigation bar, detailed information (e.g., title, date/time, audio/visual indicator, rating, and genre), and hotkey bar (defining current functional associations of hotkeys)), browse requests, and/or search requests. Commonly, the window 1100 includes suitable information about the content (such as name, duration, and/or remaining viewing duration of content), settings information, TV or system control information, application (activation) icons (such as for pre-installed and/or downloaded applications such as application center, media center and

Web browser), and/or information about input source(s), When the joystick 900 is in either the forward or reverse position, the user can select an actuator on the front of the remote control, such as the OK button 764, and be taken, by displayed images on the screen 212, to another location in the user interface, such as a desktop. This process can be done in a nonintrusive manner and without affecting the flow of content that is pushed up or down. The joystick 900 could be moved, additionally or differently, from side-to-side to cause the window to appear at the left or right edge of the screen 212.

**[0337]** An alternative actuator configuration is shown in Fig. 10. The actuators are substantially the same as those of Figs. 7-9 except that the social network button 1000, when selected, can automatically select content and publish, via a social network service or other social media, the content to a social network or online community. User or viewer comments and/or other messages can be included in the outbound message. For example, all or one or frames or portions of media content (such as a video, music, a photograph, a picture, or text) can be provided automatically to a predetermined or selected group of people via Linked-In™, Myspace™, Twitter™, YouTube™, DailyMotion™, Facebook™, Google+™) or Second Life™. The user, upon activating the button 1000 could, in response, select a social forum or media upon which the selected content (which is the content displayed to the user when the social network button 1000 is activated) is to be posted and/or a predetermined group within that social media to which the content is to be posted. Alternatively, these selections could be preconfigured or preselected by the user.

**[0338]** The social network button can also be used to "turn up" or "turn down" a social volume visualization. The Intelligent TV 100 can create dynamically a visualization of aggregated connections (and inbound and/or outbound messages) from a variety of social networks. The aggregation (and inbound and outbound messages) can be depicted graphically on the screen as a volume of connections to influence the viewer user. With a social volume visualization, selected contents of each linked social network profile of a social contact (and inbound and/or outbound messages from or to the linked social network contact and/or current activity of the social contact (such as watching the same programming or content the viewer is currently watching) can be presented in a separate tile (or visually displayed object). The size of the tile can be related to any number of criteria, including a relationship of the linked social contact (e.g., a relative degree of importance or type of relationship can determine the relative size of the tile, a degree of influence of the linked social contact to the current viewer, a geographic proximity of the linked social contact to the current viewer, a degree to which the currently provided media content is of interest to both

the viewer and linked social contact (e.g., both parties enjoy war movies, murder mysteries, musicals, comedies, and the like), an assigned ranking of the linked viewer by the viewer, a type of social network type linking the viewer with the linked social contact, a current activity of the social network contact (e.g., currently watching the same content that the viewer is currently watching), a current online or offline status of the linked social contact, and a social network grouping type or category to which both the viewer and linked social contact belong (e.g., work contact, best friend, family member, etc.).

**[0339]** The viewer can designate a portion of the screen to depict the social network aggregation. By turning the social volume up (+) or down (-), the viewer can increase the size and/or numbers of linked contact tiles provided to the viewer. In other words, by increasing the social volume the viewer can view, access, and/or push more social content from those of his or her social networks associated with him or her in a memory of the Intelligent TV. By decreasing the social volume, the viewer can view, access, and/or push less social content from his or her associated social networks. By selecting the mute button 724, the viewer can stop or pause any interactivity with his or her associated social networks (e.g., inbound or outbound messages). Social volume and/or mute can be separated into two (or more) volume settings for outbound and inbound social network activity. By way of illustration, a first volume setting, control, and/or button can control the volume for outbound social network activity (e.g., outbound social messages) while a second (different) volume setting, control, and/or button can control the volume for inbound social network activity (e.g., inbound social messages). By way of further illustration, a first mute setting, control, and/or button can stop or pause outbound social network activity (e.g., outbound social messages) while a second (different) mute setting, control, and/or button can stop or pause inbound social network activity (e.g., inbound social messages).

**[0340]** A functional block diagram of the remote control is shown in Fig. 12. The remote control 700 includes a controller 1208 to control and supervise remote control operations, optional wireless (RF) transceiver 1224 and antenna 1244 to send and receive wireless signals to and from the Intelligent TV 100 and other external components, optional infrared emitter 1228 to emit infrared signals to the Intelligent TV 100, optional light emitting diode or LED driver 1232 to control LED operation to provide video-enabled feedback to the user, actuators 1220 (including the various buttons and other actuators discussed above in connection with Figs. 7 and 10), and joystick 900, all interconnected via a bus 1248. An on board power source 1200 and power management module 1204 provide power to each of these components via power circuitry 1240. The infrared emitter 1228 and receiver (not

shown) on the Intelligent TV system 100 can be used to determine a displayed object illuminated by the infrared signal and therefore adjust the displayed image, for example to indicate a focus of the user (e.g., illuminate a displayed object or show cursor position relative to displayed objects on the screen) and to determine and activate a desired command of the user. This can be done by tracking a position of the remote control in relation to infrared tracking reference points (e.g., a sensor bar or infrared LED's) positioned on or adjacent to the screen of the Intelligent TV 100. Motion tracking can further be augmented using position information received from a multi-axis gyroscope and/or accelerometer on board the remote control (not shown).

**[0341]** An embodiment of a database 1400 for storing VOD content is shown on Fig. 14. In one non-limiting example, the database 1400 can include one or more data structures 1404 for storing individual items of content. The database 1400 can include more or fewer data structures 1404 than those shown in Fig. 14, as represented by ellipses 1452. Each data structure may contain one or more fields as shown in Fig. 14. However, each data structure may have more or fewer fields than those shown in Fig. 14, as represented by ellipses 1448.

**[0342]** The data structure 1404 can include one or more of, but is not limited to, a VOD identifier field 1408, a data field 1412, a time field 1416, a metadata field 1420, a content field 1424, a view time field 1428, a view date field 1432, a view number field 1436, a status field 1440, and/or a user-defined attribute field 1444. Each of the fields can contain information about an item of content. Content can mean any video, picture, music, or other multimedia that may be available to the user for viewing on the Intelligent TV 100. The fields may describe the content and/or information about the content.

**[0343]** A VOD identifier field 1408 can include an identifier that uniquely identifies the content associated with data structure 1404. The identifier can be any alphanumeric identifier, symbolic identifier, globally unique identifier (GUID), or other types of identifiers. The identifier in the VOD identifier field 1408 can uniquely identify the content in comparison to all other content, thus, the VOD identifier 1408 is the only identifier of its type used within the database 1400.

**[0344]** The date field 1412 may include a date at which the content was created and/or downloaded into the database 1400. The date 1412 can include any type of date format, and may be a day, a year, and/or a month. The time field 1416, similar to the date field 1412, can include a time at which the VOD was downloaded and/or created. The time 1416, with the date 1412, gives an indication to the Intelligent Television 100 about when this item of VOD content was available to the user.

**[0345]** Metadata field 1420 can include information about the VOD content. This information can include the genre of the VOD content, the actors within the content, the director for the VOD, the location in which the content was created, for instance, whether the content is movie made in the United States, an Indian movie, a European movie, etc., the year at which the movie was created, or other such information about the VOD content. This information may be used for collection sorting as described hereinafter. Field 1424 includes the data for the content. In one non-limiting example, the data can include an mpeg or other type of video format data, which can be stored within field 1424.

**[0346]** The view time and view date fields, 1428, 1432, can include the last time and date at which the user viewed the VOD content. Thus, the view time 1428 can include a time at which the user either began watching the last session with the content, or the time at which the user stopped watching the content during the last session. The view date 1432 also includes the month, day, and/or year in which the user decided to last watch the content.

**[0347]** The view number field 1436 may include a counter for the number of times the user has accessed and viewed the content in data structure 1404. The view count 1436 may be triggered by the viewing session that has lasted a predetermined period of time. For example, if the user watches an item of content for more than five minutes, the view number 1436 can increment. In other circumstances, any time an item of content is played, regardless of how long the user watches the content, the view count 1436 may increment. This view count 1436 persists into the future.

**[0348]** A status 1440 may indicate the status of the content from the last viewing session. For example, if the content was half watched, the status indictor 1440 will indicate that the content was half completed. In other examples, the status 1440 indicates only the first time status of the content. For example, during the first time the content is viewed, the status 1440 increments over some predetermined level, for example, a quarter watched, half watched, three-quarters watched, completely watched, etc. This status 1440 is maintained regardless of the number of times the content is viewed. Therefore, if a content is viewed a second time, the status 1404 may only show the content has been viewed. In other embodiments, the status 1440 may determine whether the content is new, recently viewed, a favorite, or other information.

**[0349]** User-defined field 1444 includes any kind of user-defined information about the content. For example, the user may set the content as a favorite, which may be stored in user-defined category 1444. There may be other user-defined 1444 information, such as, whether the content is for adults only, whether the content is to be maintained for a certain person, etc.

**[0350]** An embodiment of a method 1500 for sorting VOD collections is shown in Fig. 15. While a general order for the steps of the method 1500 is shown in Fig. 15, the steps may be arranged in any order.. Generally, the method 1500 starts with a start operation 1504 and ends with an end operation 1536. The method 1500 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 15. The method 1500 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 1500 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 1500 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0351]** The Intelligent TV 100 can receive content, in step 1508. In one non-limiting example, the Intelligent TV 100 may connect through a network 132 to media application 150, or another source, such as digital media library 148 for information about VOD content. This VOD content may be retrieved or pushed to the Intelligent TV 100. Regardless, the VOD content can be received through the port interface 352 and provided to the processor 364. In one non-limiting example, the processor 364 can execute a VOD subservice 620, which can receive the content through an instance of the VOD source plug-in 644. The VOD source plug-in 644 can retrieve or receive the VOD content and provide the VOD content to the VOD subservice 620 to be stored in database 632. Database 632 may be the same or similar to database 1400 as described in conjunction with Fig. 14. Thus, the information about the VOD content and the VOD content itself may be sorted and stored in fields 1408 through 1424.

**[0352]** Thereinafter, the user may select a button on the remote control 700, such as button 740, to preview or look at available VOD content. The VOD subservice 620 may read the metadata field 1420 to determine information about the VOD content. The metadata characteristics 1420 may then be used to sort the VOD content into collections, in step 1516. For example, the video subservice 620 can sort the VOD content into a collection based on geographical area or date of issue of the VOD. The VOD subservice 620 may then provide this information to the panel manager 536 of the user interface application 468. The panel manager 536 may then provide a view of the content, in step 1518. This view may be a sorted selection of content, such as a collection view 1704, shown in Fig. 17.

**[0353]** Thereinafter, the user may provide user-defined criteria. The user-defined criteria may be entered through a remote control 700, or some other user interface, and can be

provided to the VOD subservice 620. The user-defined criteria may be stored in the user-defined field 1444 of database 1400. Thereinafter, the VOD subservice 620 may determine if there are user-defined criteria that exist, in step 1520. In one non-limiting example, the user may enter a button on remote control 700 to sort the content based on the user-defined criteria. The VOD subservice 620 may then read any information from the user-defined field 1444 to determine if criteria exist. If no criteria exist, the method 1500 moves through the NO branch back to step 1516 to sort the collections based on metadata. However, if user-defined criteria does exist, the method 1500 proceeds YES to step 1524.

**[0354]** In step 1524, the VOD subservice 620 may receive the criteria and store that criteria in field 1444, in step 1525. Thus, if the data or criteria is being received by the user, the VOD subservice 620 can store any user-defined criteria in field 1444.

**[0355]** Thereinafter, the VOD subservice 620 may access the user-defined criteria 1444 to sort the collection or VOD content, in step 1528. The VOD subservice 620 may determine the sort that is desired by the user based on inputs into user interface and use that information to sort the content view. The sort may be based on such things as whether or not the content is a favorite, whether the content is appropriate for children, or some other type of criteria. Once sorted, the VOD subservice 620 provides the sort information to the panel manager 536 to provide a view of the sorted content, in step 1532. The content may have a similar view 1704, shown in Fig. 17, but have a different arrangement of the content thumbnails based on the sort criteria.

**[0356]** An embodiment of a method 1600 to provide a series of contextual and easily understood panels to navigate through VOD content is shown in Fig. 16. While a general order for the steps of the method 1600 is shown in Fig. 16, the steps may be arranged in any order.. Generally, the method 1600 starts with a start operation 1604 and ends with an end operation 1652. The method 1600 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 16. The method 1600 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 1600 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 1600 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0357]** The Intelligent TV 100 can receive a selection for VOD content, in step 1608. In one non-limiting example, the user may select a VOD button 740, on a remote control 700,

which sends a signal to the IR/RF module 354 of the Intelligent TV 100. The signal may then be sent to the processor 364, which translates the signal with a driver 420, and provides the information to the user interface 468 and the VOD subservice 620. The panel manager 536 and/or the silo manager 532 may then receive the signal through the input event dispatcher 508 from the processor 364 and act upon the signal to provide a master view of the content, in step 1612.

**[0358]** The views for the VOD content are broken down into a series of hierarchical steps that allow the user to easily navigate through VOD content. For example, the hierarchical steps may be as shown in Fig. 17 and Fig. 18. In one non-limiting example, a set of user interfaces 1700, 1800 proceed through four categories to play VOD content. A master view selection 1708, 1804 is a top tier user interface that allows the user to select a type of collection shown in tier 1712. A collection view 1704, 1808 uses a list of media based on a target or sort criteria. The user may then select some type of content from the collection view 1808 to be provided in either a digest view 1724 or a detail view 1728 in tier 1716, 1812. A digest view 1724 shows a view of a television series or series of episodes, where a description of the series and a set of episodes is provided. If there is no series with the content selected, the detail view 1728 may be provided, which gives information for the content which was selected. From one of these views, the user may then select a particular content to play or select a play icon, which may then provide a player view 1816 in tier 1720. In the player view 1816, the actual content is provided to the user and played per their selection.

**[0359]** Thus, the panel manager 536 upon having a receipt of VOD can provide the master view to the user. The master view 1900 then presents information as shown in Fig. 19. A header navigation bar 1944 provides for selections of types of VOD content. For example, the user can select showcase material 1904, movies 1908, TV series 1912, or variety programs 1916. This first selection may allow the user to navigate to a content or collection view, including that type of material. Further, there are a series of thumbnails to select to navigate to different types of collections. For example, the user can select a special topics icon 1920 to proceed to special content. The user can select a recommended thumbnail 1924 to navigate to a recommenced collection. The user can select favorites thumbnail 1928 to navigate to a favorite's collection. Similarly, the user can select a top watched thumbnail 1932 or a new thumbnail 1936 to navigate to either the top watched content or the new content. Finally, the user can select an all movies thumbnail 1940 to view a collection of all

movies currently available as VOD. The user may then make a selection of a collection using the directional pad 760 or some other remote control button.

**[0360]** The selection signal may then be received thorough the IR/RF module 354 and provided to the processor 364 to be translated by a driver 420 and the can be sent to the user interface 468. In one non-limiting example, the user interface 468 may receive collection information from the VOD subservice 620. A selection of content in the collection of content may be received, in step 1616, and can cause the panel manager 536 to provide a collection view 1712, in step 1620. The user may then select the type of content from the collection view, where this signal is received by the processor 364, in step 1624.

**[0361]** The VOD subservice 620 may then determine if the received selection is a movie, a single show, a series, or other types of content. In this way, the VOD subservice 620 can determine if a digest view or a detail view should be provided. If the selection is associated with a series with two or more episodes, a digest view 1724 should be provided. In contrast, if a single show, movie, or a series with only a single episode is selected, a detail view 1728 should be provided. Thus, the VOD subservice 620 or the panel manager 536 can determine if the selection is a movie or a series. If the selection is a series, the method 1600 proceeds through the SERIES branch to step 1632. If the selection is a movie or single show, the method 1600 moves through the MOVIE branch to step 1644.

**[0362]** In step 1632, a digest view 1724 may be provided to the user. A digest view, similar to that shown in view 1724, Fig. 17, provides a description or view of the series and then the ability to select one or more episodes in that series. The user may then move the focus onto a single episode using the directional pad 760, or some other user interface device, and select the episode to be viewed. This selection may then be received by the processor 364 and provided to user interface application 468. The selection of the episode 1636 causes the user interface to request content information 1424 from the VOD subservice 620, which can provide that content information 1424 from database 1400 to the user interface application 468. The user interface application 468 may then provide a view of the content, in step 1640. For example, the user interface application 468 can provide a player view 1720, which shows the content being viewed.

**[0363]** In the detail view provided by the user interface application 468, in step 1644, the user interface application 468 provides information specific about a single show, movie, or episode. This detail view may be the same or similar to view 1728, shown in Fig. 17. The user may select to play the episode from the detail view 1728. This selection to play may be received by the processor 364, in step 1648, through similar procedures as provided above.

The selection can cause the user interface application 468 to provide a player view 1720 and provide a view of the content, in step 1640, similar to the processes as that described above.

**[0364]** The series of views that are performed by executing process 1600 can be as shown in Fig. 18. In one non-limiting example, the series 1800 includes a master view selection 1804. By selecting something in the master view, a collection view from the set 1808 is provided. By selecting a type of content within the collection view, the Intelligent TV 100 provides either a digest view or a detailed view, such as in set 1812. By selecting to play an episode in set 1812, the Intelligent TV 100 provides a player view 1816. Fig. 18 shows the hierarchical order of the menus, which is intuitive to a user.

**[0365]** A method for providing several views of programming is shown in Fig. 20. While a general order for the steps of the method 2000 is shown in Fig. 20, the steps may be arranged in any order.. Generally, the method 2000 starts with a start operation 2004 and ends with an end operation 2040. The method 2000 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 20. The method 2000 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 2000 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 2000 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0366]** The user may select a VOD request through the remote control 700, by selecting button 740, in step 2008. The VOD selection may be received through the IR/RF module 354 at the processor 364. The signal may be translated by a driver 420 and provided to the VOD subservice 620 and/or the user interface application 468.

**[0367]** The user interface application 468 may execute a panel manager 536 or silo manager 532 through the input event dispatcher 508 to switch to the VOD silo through the silo transition control 504. The silo manager 532 may then provide a master layout view with collections for showcase, movie, TV, and variety programs, in step 2012. For example, the panel manage 536 may provide the panel shown in Fig. 21. In one non-limiting example, the user interface 2100 provides a navigation bar 2120 having selectable devices 2104 through 2116. The device 2104 allows the user to select a master layout view for showcase material. The user interface device 2108 allows the user to select a master layout view for movies. The user interface device 2112 allows the user to select a master layout for TV series, while selecting device 2116 provides a master layout for variety programs.

**[0368]** The user may then use the directional pad 760, or some other remote control button on remote control 700, to select one of the four user interface devices, 2104 through 2116, on the navigation bar 2120. For example, the user may put the focus (*e.g.,* the focus is currently on the "Showcase" selection 2104 in Fig. 21) on one of the text displays in navigation bar 2120 in user interface 2100, and then select an OK button 764 to select the material for that user interface device 2104-2116.

**[0369]** The selection is received, again, through the processor 364 and provided to the panel manager 536, in step 2016. The panel manager 536 must then determine which of the four categories was selected, in step 2020. In one non-limiting example, the panel manager 536 determines which of the devices 2104 through 2116 had focus when selected by the user. If the selection was for the "Showcase" 2104, the method 2000 proceeds to the SHOWCASE branch to step 2024. If the selection was for a "movie" 2108, the method 2000 proceeds to the MOVIE branch to step 2028. If the user selected the "TV series" device 2112, method 2000 proceeds to the TV branch to step 2032. Finally, if the user selected device 2116, the method 2000 proceeds to the VARIETY branch to step 2036.

**[0370]** In step 2024, the panel manager 526 provides a showcase user interface, in step 2024. For example, the panel manager 536 may provide the showcase user interface 2200 shown in Fig. 22. In one non-limiting example, the showcase view provides thumbnails 2204 through 2216. Each of these thumbnails represents a different topic or collection of showcase material. Showcase material can be any type of material from the other categories that is pertinent to the user and in which the user may have a desire to watch. Thus, the showcase view 2200 has selection of content from all categories and may be organized by last viewed, represented by thumbnail 2204, special topics content, represented by thumbnail 2208, top watched content, represented by thumbnail 2212, and/or high definition content, represented by thumbnail 2216. Thus, the showcase user interface can organize all content based on criteria that are either user-defined criteria or are predetermined criteria based on statistics associated with the underlying content.

**[0371]** If the user selects the variety user interface device 2212, the panel manager 536 can provide a panel manager user interface 2300 as shown in Fig. 23. Variety programming can be any programming not necessarily associated with a movie or TV series. For example, variety programming can include documentaries, special interest shows, or other types of content. The variety programs can have one or more thumbnails, which organize the content and allow the user to select a collection to define content. These thumbnails may represent certain topics, for example, thumbnail 2304 represents specials topics contents, thumbnail

2308 represents recommended content, thumbnail 2312 represents user selected favorites content, thumbnail 2304 represents new content, thumbnail 2320 represents top watched or most viewed content, and thumbnail 2316 can represent all types of variety content. These thumbnails 2304-2324 may be selected by the user to be provided with a collection view that is organized based on the associated category that was chosen by the user. Thumbnails may be provided from the thumbnail database 632.

**[0372]** If the user selects the movie device 2108, the panel manager 536 can provide user interface 2400 shown in Fig. 24. The panel manager, in step 2028, provides this user interface 2400 with thumbnails 2404-2424, similar to those described in conjunction with the variety user interface in Fig. 23. Thus, the user may, again, select one or more movies, or collections of movies, based on the top categories or the categories listed by the thumbnails in user interface 2400.

**[0373]** If the user selects the TV series device 2112, the panel manager 536 can provide a TV user interface 2500 shown in Fig. 25, in step 2032. In one non-limiting example, the panel manager 536, again, provides a series of thumbnails 2504-2524, which may be the same or similar to those described in conjunction with the variety user interface in Fig. 23. Further, one or more of the thumbnails may provide several views of different content. For example, user interface device 2504 may sequence through a series of thumbnails representing different types of series. For example, the user interface device 2504 shows a "Game of Thrones" thumbnail. However, the next sequenced thumbnail may apply to the TV series "Homeland." Thus, the user may view more types of content within one area of user interface 2500 than that shown in any instant of time. These types of sequenced or moving thumbnails may be used in any of the user interfaces described hereinabove.

**[0374]** An embodiment of the method 2600 for providing a collection view of content is shown in Fig. 26. While a general order for the steps of the method 2600 is shown in Fig. 26, the steps may be arranged in any order.. Generally, the method 2600 starts with a start operation 2604 and ends with an end operation 2636. The method 2600 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 26. The method 2600 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 2600 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 2600 shall be explained with reference to the

systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0375]** The panel manager 536 can provide a master layout view, in step 2608. Thus, as described in conjunction with Figs. 2000 through 2500, the panel manager 536 using information provided by the VOD subservice 620 can provide a master layout view.

**[0376]** The user may select a thumbnail within one of the user interface devices shown in Figs. 21 through 25. The selection may be made using a directional pad 760 to change the focus onto one of the thumbnails and, using the OK button 764, select that thumbnail. The remote control signal may then be sent to the Intelligent TV 100 through the IR/RF module 354 to the processor 364. A driver 420 interprets the signal and provides the translation to the user interface application 468. In one non-limiting example, an input event dispatcher 508 may then send that information to the panel manager 536 to indicate that a selection has been made. A panel manager 536 thus can receive the selection, in step 2612.

**[0377]** Based on the selection, the panel manager 536 sends the information of the selection to the VOD subservice 620. The VOD subservice 620 may then determine which content is applicable to the selection, in step 2616. In one non-limiting example, the VOD subservice 620 may be provided information from the panel manager 536 as to which of the category was selected. For example, the user can select high definition content, most watched content, top favorites content, most viewed content, or other types of content, as described in conjunction with Figs. 20 through 25. Once determined, the VOD subservice 620 may then access database 632 that includes the information described in Fig. 14.

**[0378]** In one non-limiting example, the VOD subservice 620 may search metadata 1420 or other information in fields 1428 through 1444 and fields 1412 through 1416. This information may be accessed to determine which content applies to the selected category. For example, most recent or new content may have a date and time 412, 416, that is within a certain timeframe or period of time. Further, the VOD subservice 620 can access the view count 1436 to determine if the information has been viewed or is new. The view time and view date 428 and 432 may also be used to determine whether the content is new. Further, the view count 436 may be used to determine if the content is most watched. The status indicator 1440 can also be used to provide information for different categories; also, the user-defined field 1444 can be used to determine if the item is a favorite. Thus, the VOD subservice 620 can access any of the information in data structure 1404 to determine which content is applicable to the selection. This content may then be provided to the panel manager 536.

**[0379]** The panel manager 536 can then provide a new view of a collection of content, in step 2612. In the content view, the panel manager 536 can now provide a series of filter criteria to allow the user to further filter the collections to better target a particular type or single item of content, in step 2612. The panel manager 536 can provide a first user interface having one or more filter criteria, such as user interface 2700. For example, in Fig. 27A, user interface 2700 provides one or more filter criteria shown in section 2704. In one non-limiting example, the filter criteria 2704 can apply to a region in which the movie was created 2708. Past filter criteria are shown in section 2712. The filter criteria 2704 can include a type of content, a year in which content was made, or other such types of filtering selections.

**[0380]** The user may then move the focus, with the directional pad 760, to highlight one of the filter selections. The selection may be selected, by using button 764, to send a signal to the Intelligent Television 100. The signal is received as described hereinbefore and provided to the panel manager 536. The panel manager 536 determines the selection made and provides that to the video subservice 620, which further refines the search for content provided to the panel manager 536. The panel manager 536 may then provide a next user interface with the content filtered, in step 2620. Thus, the user can navigate through one or more different types of filters to better categorize or reduce the amount of content available for selection, such as user interfaces 2720 and 2724 in Figs. 27B and 27C.

**[0381]** The panel manager 536 can then determine if the current selection is the last filter selection made, in step 2624. For example, the user may be able to select a content viewed in section 2716, in which case no further filter criteria is needed. In other embodiments, it may be the last of the type of filter criteria available or there may be only a single item of content or a small set of content to be provided in a last screen. If it is the last filter criteria selected, the method 2600 proceeds YES to step 2628. If it is not the last filter criteria selected, the method 2624 can proceed through the NO branch back to step 2612 to receive another filter selection. In step 2628, the VOD subservice 620 provides the last selection of content to the panel manager 536. The panel manager 536 may then present this content to the user. The user may then select a content, in which case the panel manager 536 receives that selection, in step 2628. Based on that type of selection, the panel manager 536 may provide a detailed view, described hereinbefore, to view the content for the user, in step 2632.

**[0382]** The filter views can be presented in two types of user interfaces shown in Figs. 28 and 29. The user interface 2800 provides a filter bar or filter categories in the navigation bar as shown in user interface 2800. The filter bar can include one or more filter criteria as

shown in section or view 2804. Thus, depending on the types of filter category, including genres, dates, regions, etc., the navigation bar can contain different filter criteria.

**[0383]** In Fig. 29, the filter criteria may be provided in one or more areas inside a user interface 2900. For example, a last used filter criteria may be shown in section 2904, while selectable filter criteria may be shown in section 2908. A view of possible content associated or that may be provided with such a search is shown in section 2912. The user interface 2900, shown in Fig. 29, may be the same or similar as that shown in Fig. 27A.

**[0384]** An embodiment of a method 3000 for providing a collection view after filtering category is shown in Fig. 30. While a general order for the steps of the method 3000 is shown in Fig. 30, the steps may be arranged in any order.. Generally, the method 3000 starts with a start operation 3004 and ends with an end operation 3036. The method 3000 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 30. The method 3000 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 3000 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 3000 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0385]** The panel manager 536 can receive a selection for a collection of movies from a master view or collection view after a filtered category selection, in step 3008. For example, after proceeding through the process described in conjunction with Fig. 26, the panel manager 536 may determine a collection of movies that applies to the filter categories provided by the user. This final selection received through the remote control 700 at the panel manager 536 can be provided to the VOD subservice 620.

**[0386]** The VOD subservice 620 can determine the collection of movies that apply to the filter category, in step 3012. The panel manager 536 thus provides the VOD subservice 620 with the filtering categories or information in which the VOD subservice 620 searches the database 1400 for content applicable to that filter selection or selections. This collection of content may be provided back to the panel manager 536 with the thumbnail information or other content information. The thumbnails may be retrieved by the thumbnail cache manager 660 from the thumbnails database 668. This collection information is then given to the panel manager 536.

**[0387]** The panel manager 536 may then provide the catalog view of the collection, in step 3016. For example, the panel manager 536 can provide a user interface similar to that shown in Fig. 31. In one non-limiting example, the user interface 3100 is directed towards movie content as indicated by the title 3104. At least three filter criteria have been received, as shown in navigation bar 3108. The collection view includes a content area 3112 that provides one or more thumbnails that are associated with content that are available based on the filter criteria in 3108. For example, thumbnail 3116 can be for a movie that is returned by the VOD subservice 620 based on the filter criteria 3108. The thumbnails, such as thumbnail 3116, are selectable and, if selected, instruct the Intelligent TC 100 to provide content.

**[0388]** An embodiment of a method 3200 for providing a catalog view and subsequent detail and series use for TV series and/or variety series is shown in Fig. 32. While a general order for the steps of the method 3200 is shown in Fig. 32, the steps may be arranged in any order. Generally, the method 3200 starts with a start operation 3204 and ends with an end operation 3252. The method 3200 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 32. The method 3200 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 3200 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 3200 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0389]** On receiving filter criteria, in step 3212, the panel manager 536 and VOD subservice 620 can provide a catalog view, in step 3216. Receiving a filter criteria and providing a catalog view may be as described in conjunction with Figs. 26 and 30 described hereinbefore.

**[0390]** The panel manager 536 may receive a series selection, in step 3220. In one non-limiting example, the user may use the remote control 700 to move a focus with the directional pad 760 and select the focused thumbnail with button 764. For example, as shown in Fig. 33, the focus, in user interface 3300, is placed on the series "Game of Thrones," represented by thumbnail 3304. The thumbnails, shown in user interface 3300, were provided in reaction to providing filter criteria 3308. The user may select the Game of Thrones thumbnail by selecting the OK button 764. The selection for this series is received by the panel manager 536, in step 3220.

**[0391]** The selection may then be provided to the VOD subservice 620. The VOD subservice 620 may then determine if there is more than one season available for the series selected, *e.g.,* "Game of Thrones," in step 3224. If there is only a single season, the method proceeds through the ONE branch to step 3232. However, if there is more than one season, the method proceeds through the GREATER THAN ONE branch to step 3228.

**[0392]** In step 3228, the VOD subservice 620 may determine if all the seasons, or episodes within the seasons, have been aired. For example, if there are four seasons and the fourth season is completely aired, then the sort criteria can be different. However, if the fourth season has not been completely aired, there may be different sort criteria for that situation. If all seasons have been aired, the seasons can be ordered and provided to the panel manager 536 in order from the first season to the last season. However, if the last season has not been fully aired, these seasons are provided to the panel manager 536 from the most recent season to the oldest season.

**[0393]** The VOD subservice 620 can also determine, in step 3232, if the series is fully archived. In this case, for example, if all the episodes within a season have been received and archived in the VOD database 632. If the series is fully archived, the method 3200 proceeds YES to step 3236. If the season is not fully archived, then the method proceeds NO to step 3240.

**[0394]** The VOD subservice 620 can provide the series with the episodes arranged in ascending order if all the series have been archived, in step 3236. For example, if the fourth season is fully archived, the episodes within that season may be listed from episode one to the last episode. In contrast, in step 3240, if the series is not fully archived, the VOD subservice 620 can arrange the episodes in descending order. For example, if season four is not fully archived, the episodes may be arranged from the last latest episode to the first episode.

**[0395]** The panel manager 536 may receive this information and then provide a user interface having this type of arranged seasons and episodes, in step 3242. For example, the panel manager 536 can provide a user interface 3400 similar to that shown in Fig. 34. In one non-limiting example, the user interface 3400 includes a section for the season listings 3412. As explained previously, if the seasons are fully aired, the user interface device 3416 will contain the first season, while the user interface device 3420 can include the last season. In contrast, if the seasons are not fully aired, user interface device 3416 will include the last season, while device 3350 will include the first season or earlier seasons.

**[0396]** The episodes may be arranged in section 3404. Again, as explained previously, if the seasons are fully archived, the episodes are arranged in ascending order with display 3424

including the first episode of the season and with user interface section 3428 including a later aired episode. In contrast, if the episode or season is not fully archived, user interface portion 3424 can provide information about the last aired episode, while a portion 3428 will include information about an episode aired previously or in the past. The section 3408 may include information about the series, including a poster or thumbnail that gives a visual representation of the season, and a description of the series.

**[0397]** Another example of the digest view for a series of television shows or variety shows is shown in Fig. 35. The user interface 3500 can display a series, *e.g.,* Game of Thrones. The season listing is shown in section 3504, while the episode listings for season three is shown in section 3508. One episode 3512 is shown in focus. These displays are governed by the same rules that were explained previously.

**[0398]** The user may then select an episode using the directional pads 760 and the selection button 764 as described herein, in step 3244. The selection may be for an episode. For example, the episode with the focus 3512 shown in Fig. 35 may be selected. On receiving a selection, the VOD subservice 620 can provide the content information 354 to the panel manager 536. The panel manager 536 may then provide a view for playback 3600 shown in Fig. 36, in step 3248. In one non-limiting example, the user interface 3600 can provide the content in portion 3616. The user may control the playback using playback controls 3612. Uniquely, the playback user interface 3600 can also show tiles of thumbnails that are selectable by the user to move to a next episode 3604 or previous episode 3608 in the series. In this way, for TV series or variety series, the user may easily navigate between episodes in a season with these controls in the playback view.

**[0399]** A method 3700 for toggling between the status of programs is shown in Fig. 37. While a general order for the steps of the method 3700 is shown in Fig. 37, the steps may be arranged in any order.. Generally, the method 3700 starts with a start operation 3704 and ends with an end operation 3724. The method 3700 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 37. The method 3700 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or stored on a computer readable medium. Further, the method 3700 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 3700 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0400]** In one non-limiting example, the user may be provided a catalog view, in step 3708. The panel manager 536 can provide a catalog view, similar to that shown in Fig. 38. In one non-limiting example, the catalog view 3800 includes a bunch of thumbnails for example, thumbnail 3804, that are associated with a type of content. These content thumbnails may be arranged in any type of order based on filter criteria. The user may then select an icon 3808 to watch the content provided in the catalog view 3800. This selection may be completed, for example, by the user placing focus on device 3808 with the directional pad 716 and selecting device 3808 with the button 764. In other embodiments, the device 3808 may be associated with button 794, and when selected, automatically selects device 3808. This selection is received by the processor 364 and provided to the panel manager 536 in step 3712.

**[0401]** Based on the selection, the content in user interface 3800 may be arranged based on whether the program has been watched or not. For example, the user may select to watch only programs that have been previously watched, which may be displayed in user interface 3800. However, the watch status may be different, and the user may desire to watch programs that are in progress. Further, the user may desire to watch only programs or view programs that have not been watched previously. Thus, the panel manager 536 can determine which category or watched category is requested, in step 3716.

**[0402]** In step 3716, the panel manager 536 may determine the context of the interface 3800. The context means what type of watched status is currently being displayed. If the user interface device 3808 is selected, the panel manager 536 can determine what is the next category for watched status. The next category may then be provided to the VOD subservice 620 to search the database 1400 for status information 1370, which is associated with that watched category. The content having that watched status is provided back to the panel manager 536 to render in the user interface 3800. Thus, the content thumbnails shown in user interface 3800 will change based on the watched status being provided. Thus, the panel manager 536 can change the view of user interface 3800 to sort by the watched category, in step 3720. The view may thus be toggled between watched status, in progress status, or not watched status.

**[0403]** A method 3900 for providing playback of VOD is shown in Fig. 39. While a general order for the steps of the method 3900 is shown in Fig. 39, the steps may be arranged in any order. Generally, the method 3900 starts with a start operation 3904 and ends with an end operation 3940. The method 3900 can include more or fewer steps or can arrange the order of the steps differently than those shown in Fig. 39. The method 3900 can be executed as a set of computer-executable instructions, executed by a computer system, and encoded or

stored on a computer readable medium. Further, the method 3900 can be executed by a gate or other hardware device or component in an Application Specific Integrated Circuit, a Field Programmable Gate Array, or other type of hardware device. Hereinafter, the method 3900 shall be explained with reference to the systems, components, modules, software, data structures, user interfaces, etc. described herein.

**[0404]** A user interface application 468 provides a catalog view for an item of content, in step 3908. A catalog view may be as described in conjunction with Fig. 38. The intelligent television 100 can receive a selection to play VOD content, in step 3912. The user may place focus on a selection 3804 in the catalog view 3800 and press a select button using a remote control 700, as has been described previously herein.

**[0405]** The selection signal may be sent to the user interface application 468 and/or the VOD subservice 620. The user interface application 468 and/or the VOD subservice 620 may then determine if a user has previously watched the selected content, in step 3916. The VOD subservice 620 stores the watch status 1440 in database 1400, as described in conjunction with Fig. 14. The status 1440 is associated with the content 1424 in data structure 1404. This status information 1440 may be retrieved from the data base 1400 by the VOD subservice 620 and provided to the user interface application 468.

**[0406]** If the user has previously watched the content, the method 3900 proceeds YES to step 3920. In step 3920, the user interface application 468 may then, based on if the status 1440 shows that the user previously viewed the content, prompt the user if the user desires to resume watching the content. The user interface application 468 can provide a notification or other user interface device alerting the user that the user had previously watched the content. The user interface device may have a selectable button or other device to resume watching the content. The user interface application can determine if the user desires to resume watching the content based on the selection of the button, in step 3920. If the user selects the button, the method 3900 proceeds YES to step 3924 where the content is resumed from the point at which the user had stopped watching. If the user does not select the button, the method 3900 proceeds NO to step 3928 where the user interface application 468 begins the playback of the content from a beginning of the content. If the user has not previously watched the content, the method 3900 proceeds NO to step 3928 where the user interface application 468 also plays the content from a beginning of the content.

**[0407]** During playback, the user may select a button on a remote control 700 to view playback controls, in step 3932. The playback controls may be the same or similar to those described in conjunction with Fig. 36. In response to receiving the playback controls

selection, the user interface application 468 can provide the playback controls for a predetermined amount of time, in step 3936. The predetermined amount of time can be any time period, for example, 10 seconds, a minute, five minutes, etc.

**[0408]** The playback controls 3612 may be in a footer, as shown in Fig. 36. A first user-selectable device 3608 for navigating to a previous episode may be provided to the left of the playback controls 3612 in the footer. A second user-selectable device 3604, for navigating to a next episode, may be provided to a right of the playback controls 3612 in the footer. The playback controls 3612 can include selections to rewind the content, forward the content, play the content, and pause the content. Other controls are possible and envisioned.

**[0409]** The exemplary systems and methods of this disclosure have been described in relation to an Intelligent Television. However, to avoid unnecessarily obscuring the present disclosure, the preceding description omits a number of known structures and devices. This omission is not to be construed as a limitation of the scopes of the claims. Specific details are set forth to provide an understanding of the present disclosure. It should however be appreciated that the present disclosure may be practiced in a variety of ways beyond the specific detail set forth herein.

**[0410]** Furthermore, while the exemplary aspects, embodiments, and/or configurations illustrated herein show the various components of the system collocated, certain components of the system can be located remotely, at distant portions of a distributed network, such as a LAN and/or the Internet, or within a dedicated system. Thus, it should be appreciated, that the components of the system can be combined in to one or more devices, or collocated on a particular node of a distributed network, such as an analog and/or digital telecommunications network, a packet-switch network, or a circuit-switched network. It will be appreciated from the preceding description, and for reasons of computational efficiency, that the components of the system can be arranged at any location within a distributed network of components without affecting the operation of the system. For example, the various components can be located in a switch such as a PBX and media server, gateway, in one or more communications devices, at one or more users' premises, or some combination thereof. Similarly, one or more functional portions of the system could be distributed between a telecommunications device(s) and an associated computing device.

**[0411]** Furthermore, it should be appreciated that the various links connecting the elements can be wired or wireless links, or any combination thereof, or any other known or later developed element(s) that is capable of supplying and/or communicating data to and from the connected elements. These wired or wireless links can also be secure links and may be

capable of communicating encrypted information. Transmission media used as links, for example, can be any suitable carrier for electrical signals, including coaxial cables, copper wire and fiber optics, and may take the form of acoustic or light waves, such as those generated during radio-wave and infra-red data communications.

**[0412]** Also, while the flowcharts have been discussed and illustrated in relation to a particular sequence of events, it should be appreciated that changes, additions, and omissions to this sequence can occur without materially affecting the operation of the disclosed embodiments, configuration, and aspects.

**[0413]** In another embodiment, the systems and methods of this disclosure can be implemented in conjunction with a special purpose computer, a programmed microprocessor or microcontroller and peripheral integrated circuit element(s), an ASIC or other integrated circuit, a digital signal processor, a hard-wired electronic or logic circuit such as discrete element circuit, a programmable logic device or gate array such as PLD, PLA, FPGA, PAL, special purpose computer, any comparable means, or the like. In general, any device(s) or means capable of implementing the methodology illustrated herein can be used to implement the various aspects of this disclosure. Exemplary hardware that can be used for the disclosed embodiments, configurations and aspects includes computers, handheld devices, telephones (e.g., cellular, Internet enabled, digital, analog, hybrids, and others), and other hardware known in the art. Some of these devices include processors (e.g., a single or multiple microprocessors), memory, nonvolatile storage, input devices, and output devices. Furthermore, alternative software implementations including, but not limited to, distributed processing or component/object distributed processing, parallel processing, or virtual machine processing can also be constructed to implement the methods described herein.

**[0414]** In yet another embodiment, the disclosed methods may be readily implemented in conjunction with software using object or object-oriented software development environments that provide portable source code that can be used on a variety of computer or workstation platforms. Alternatively, the disclosed system may be implemented partially or fully in hardware using standard logic circuits or VLSI design. Whether software or hardware is used to implement the systems in accordance with this disclosure is dependent on the speed and/or efficiency requirements of the system, the particular function, and the particular software or hardware systems or microprocessor or microcomputer systems being utilized.

**[0415]** In yet another embodiment, the disclosed methods may be partially implemented in software that can be stored on a storage medium, executed on programmed general-purpose

computer with the cooperation of a controller and memory, a special purpose computer, a microprocessor, or the like. In these instances, the systems and methods of this disclosure can be implemented as program embedded on personal computer such as an applet, JAVA® or CGI script, as a resource residing on a server or computer workstation, as a routine embedded in a dedicated measurement system, system component, or the like. The system can also be implemented by physically incorporating the system and/or method into a software and/or hardware system.

**[0416]** Although the present disclosure describes components and functions implemented in the aspects, embodiments, and/or configurations with reference to particular standards and protocols, the aspects, embodiments, and/or configurations are not limited to such standards and protocols. Other similar standards and protocols not mentioned herein are in existence and are considered to be included in the present disclosure. Moreover, the standards and protocols mentioned herein and other similar standards and protocols not mentioned herein are periodically superseded by faster or more effective equivalents having essentially the same functions. Such replacement standards and protocols having the same functions are considered equivalents included in the present disclosure.

**[0417]** The present disclosure, in various aspects, embodiments, and/or configurations, includes components, methods, processes, systems and/or apparatus substantially as depicted and described herein, including various aspects, embodiments, configurations embodiments, subcombinations, and/or subsets thereof. Those of skill in the art will understand how to make and use the disclosed aspects, embodiments, and/or configurations after understanding the present disclosure. The present disclosure, in various aspects, embodiments, and/or configurations, includes providing devices and processes in the absence of items not depicted and/or described herein or in various aspects, embodiments, and/or configurations hereof, including in the absence of such items as may have been used in previous devices or processes, e.g., for improving performance, achieving ease and\or reducing cost of implementation.

**[0418]** The foregoing discussion has been presented for purposes of illustration and description. The foregoing is not intended to limit the disclosure to the form or forms disclosed herein. In the foregoing Detailed Description for example, various features of the disclosure are grouped together in one or more aspects, embodiments, and/or configurations for the purpose of streamlining the disclosure. The features of the aspects, embodiments, and/or configurations of the disclosure may be combined in alternate aspects, embodiments, and/or configurations other than those discussed above. This method of disclosure is not to

be interpreted as reflecting an intention that the claims require more features than are expressly recited in each claim. Rather, as the following claims reflect, inventive aspects lie in less than all features of a single foregoing disclosed aspect, embodiment, and/or configuration. Thus, the following claims are hereby incorporated into this Detailed Description, with each claim standing on its own as a separate preferred embodiment of the disclosure.

**[0419]** Moreover, though the description has included description of one or more aspects, embodiments, and/or configurations and certain variations and modifications, other variations, combinations, and modifications are within the scope of the disclosure, e.g., as may be within the skill and knowledge of those in the art, after understanding the present disclosure. It is intended to obtain rights which include alternative aspects, embodiments, and/or configurations to the extent permitted, including alternate, interchangeable and/or equivalent structures, functions, ranges or steps to those claimed, whether or not such alternate, interchangeable and/or equivalent structures, functions, ranges or steps are disclosed herein, and without intending to publicly dedicate any patentable subject matter.

What is claimed is:

1. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, content for VOD;

determining metadata characteristics for the content;

storing the metadata characteristics with the content in a database for VOD content; and

providing a first view of the VOD content based on the metadata characteristics.

2. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a VOD data service operable to:

receive content for VOD;

determine metadata characteristics for the content;

store the metadata characteristics with the content in a database for VOD content; and

execute a user interface application in communication with the VOD data service, the user interface application operable to provide a first view of the VOD content based on the metadata characteristics.

3. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a first selection for VOD content;

in response to the first selection, providing a master view of VOD content;

receiving a second selection for VOD content;

in response to the second selection, providing a collection view of the VOD content;

receiving a third selection for VOD content; and

in response to the third selection, providing either a detail view or a digest view of the VOD content.

4. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive a first selection for VOD content;

in response to the first selection, provide a master view of VOD content;

receive a second selection for VOD content;

in response to the second selection, provide a collection view of the VOD content;

receive a third selection for VOD content; and

in response to the third selection, provide either a detail view or a digest view of the VOD content.

5. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a selection for VOD content;

providing a first user interface having a selection for one or more of showcase content, movie content, television content, or variety content;

receiving a second selection;

determining whether the second selection is for showcase content, movie content, television content, or variety content; and

based on the determination, provide a second user interface having content associated showcase content, movie content, television content, or variety content.

6. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive a selection for VOD content;

provide a first user interface have a selection for one or more of showcase content, movie content, television content, or variety content;

receive a second selection;

determine whether the second selection is for showcase content, movie content, television content, or variety content; and

based on the determination, provide a second user interface have content associated showcase content, movie content, television content, or variety content.

7. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

providing a first collection view of VOD content;

receiving, by a processor of the intelligent television, a first selection to filter the VOD content;

determining content applicable to the received selection; and

providing a second collection view of the filtered content.

8. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

provide a first collection view of VOD content;

receive a first selection to filter the VOD content;

determine content applicable to the received selection; and

provide a second collection view of the filtered content.

9. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a filter criteria;

providing a catalog view of one or more television series associated with the filter criteria;

receiving a selection of a television series from the catalog view;

determining if the television series includes one season; and

if there is only one season, providing a first digest view of the season.

10. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive a filter criteria;

provide a catalog view of one or more television series associated with the filter criteria;

receive a selection of a television series from the catalog view;

determine if the television series includes one season; and

if there is only one season, provide a first digest view of the season.

11. A method for providing one of two types of user interfaces in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a filter criteria;

providing a catalog view of one or more television series associated with the filter criteria;

receiving a selection of a television series from the catalog view;

determining if the television series includes one season;

if there is only one season, providing a first digest view of the season;

receiving a second selection of an episode; and

playing the episode in a series player including a user-selectable device to navigate to at least one of a next episode or a previous episode.

12. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive, by a processor of the intelligent television, a filter criteria;

provide a catalog view of one or more television series associated with the filter criteria;

receive a selection of a television series from the catalog view;

determine if the television series includes one season;

if there is only one season, provide a first digest view of the season;

receive a second selection of an episode; and

play the episode in a series player including a user-selectable device to navigate to at least one of a next episode or a previous episode.

13. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

providing, by a processor of the intelligent television, a catalog view of two or more items of content;

receiving a selection to sort the items of content based on a watched status; and

providing a second catalog view where two or more items of content are presented, wherein the presented items of content have the selected watch status.

14. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

provide a catalog view of two or more items of content;

receive a selection to sort the items of content based on a watched status; and

provide a second catalog view where two or more items of content are presented, wherein the presented items of content have the selected watch status.

15. A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

providing, by a processor of the intelligent television, a catalog view for an item of content;

receiving a selection to play content;

determining if a user has previously watched the content; and

if the user has previously watched the content, prompting the user if the user desires to resume watching the content.

16. An intelligent television system comprising:

a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

provide a catalog view for an item of content;

receive a selection to play content;

determine if a user has previously watched the content; and

if the user has previously watched the content, prompt the user if the user desires to resume watching the content.

**ABSTRACT**

An intelligent television can provide various interfaces for providing video-on-demand (VOD). The user interfaces include unique visual representations and organizations that allow the user to utilize the intelligent television more easily and more effectively. Particularly, the user interfaces pertain to the display of VOD content and better organizations thereof. Further, the user interfaces provide unique process of transitioning between the VOD content.

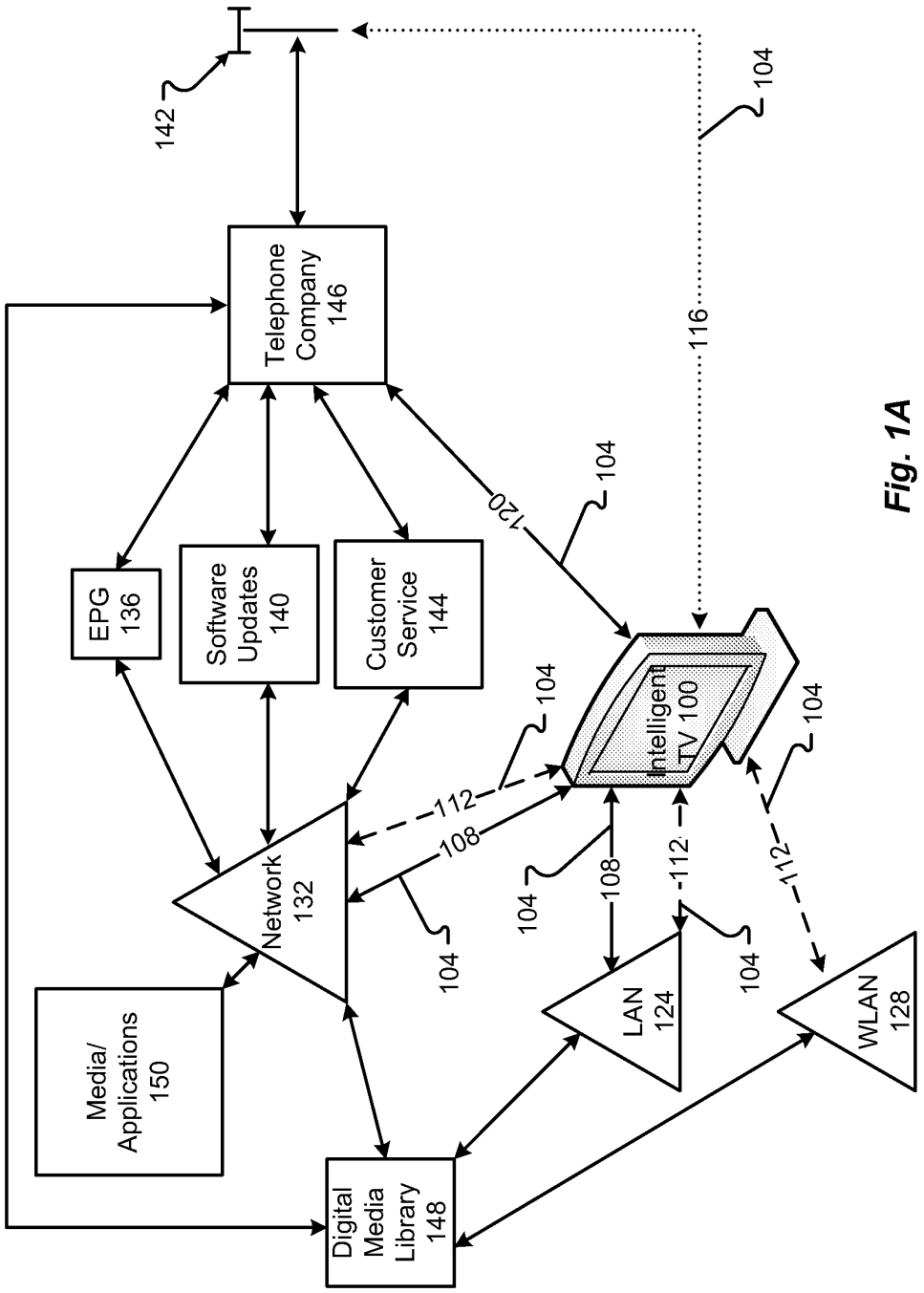

142
104
Telephone Company 146
116
120
104
EPG 136
Software Updates 140
Customer Service 144
Intelligent TV 100
104
104
112
108
Network 132
104
104
108
112
112
104
Media/ Applications 150
LAN 124
WLAN 128
Digital Media Library 148

*Fig. 1A*

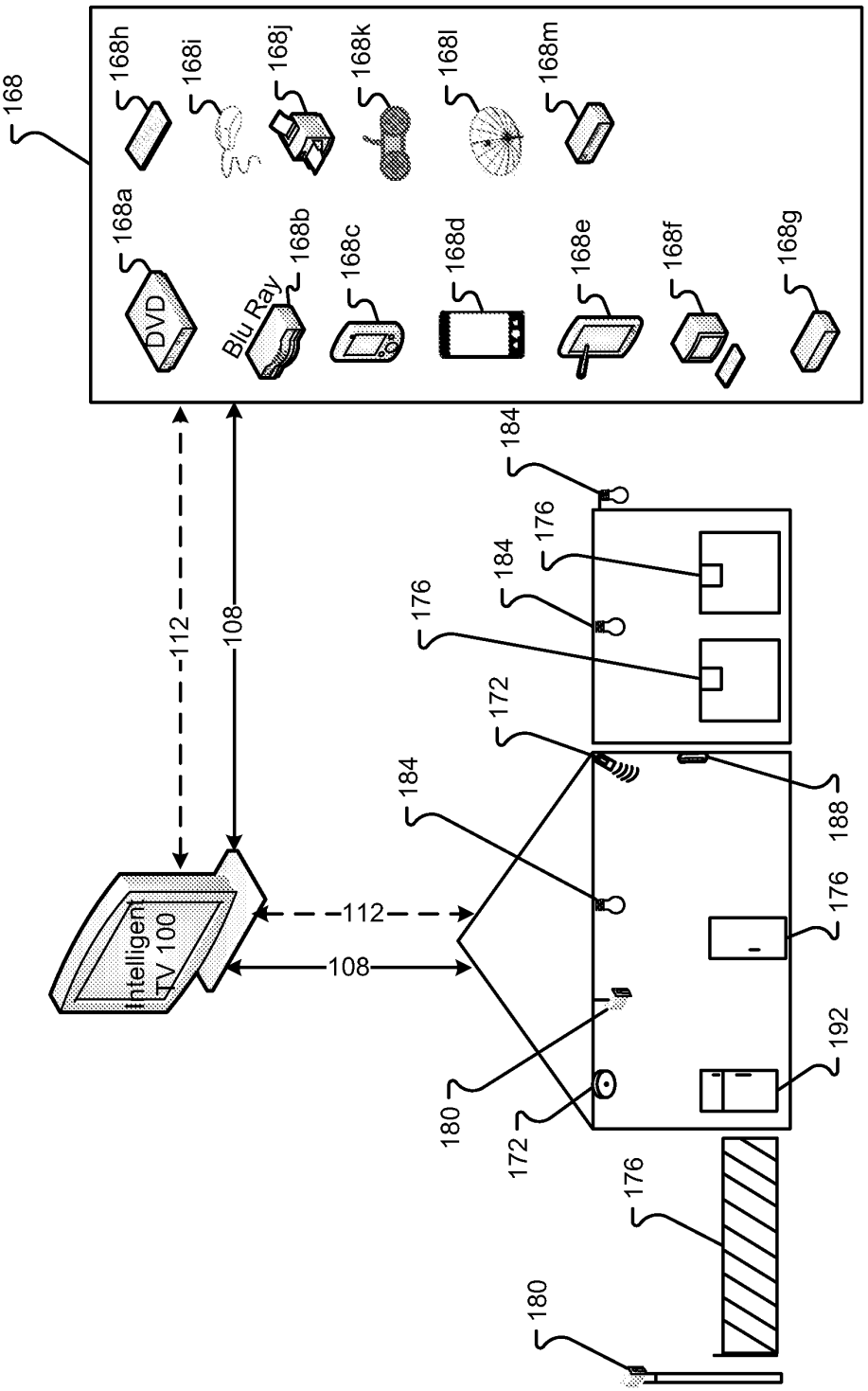

168
168h
168i
168j
168k
168l
168m
168a
168b
168c
168d
168e
168f
168g
DVD
Blu Ray
112
108
184
176
172
188
180
192
Intelligent TV 100

Fig. 1B

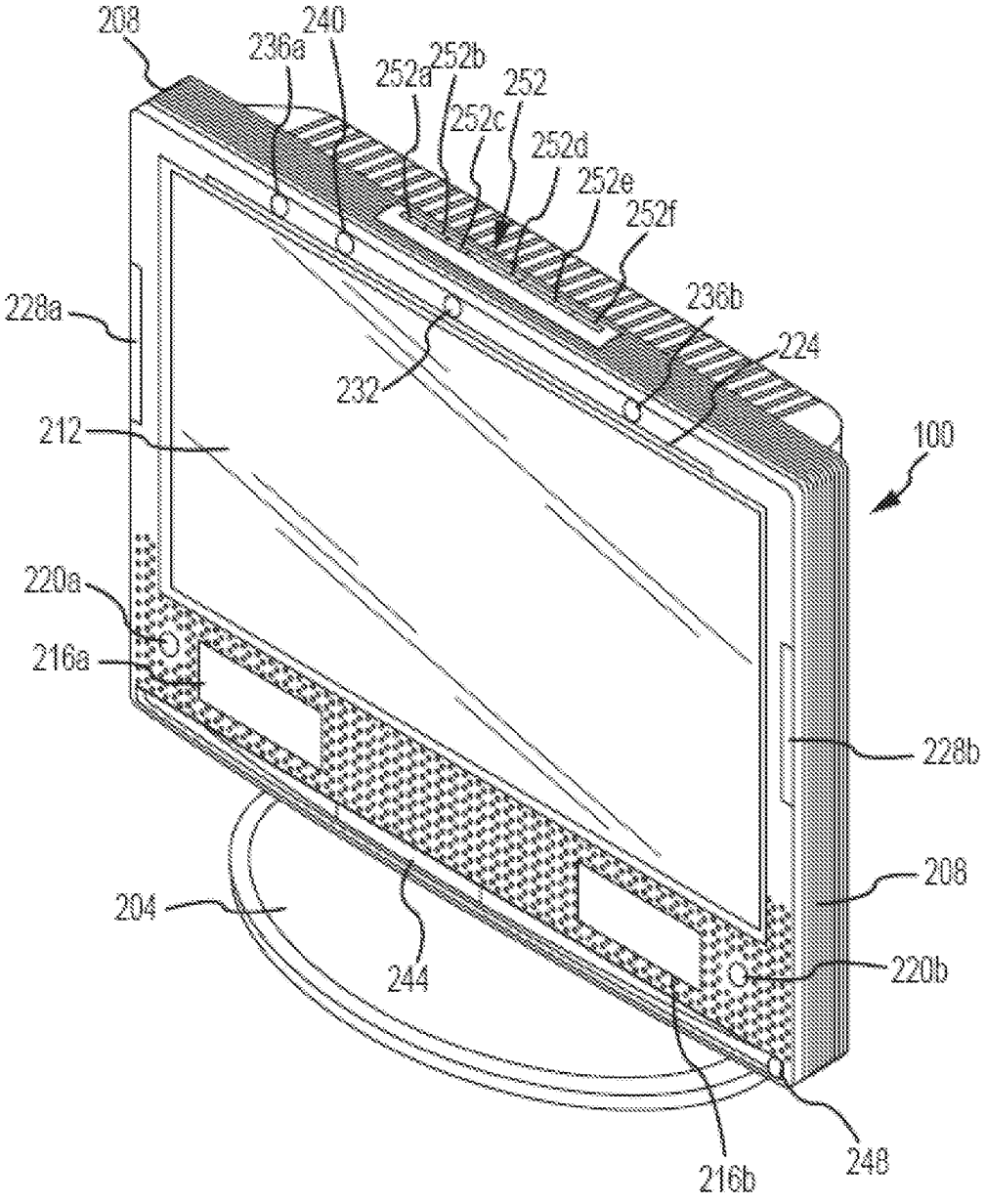

208
240
236a
252a
252b
252
252c
252d
252e
252f
236b
224
228a
232
212
100
220a
216a
228b
208
204
244
220b
216b
248

***Fig. 2A***

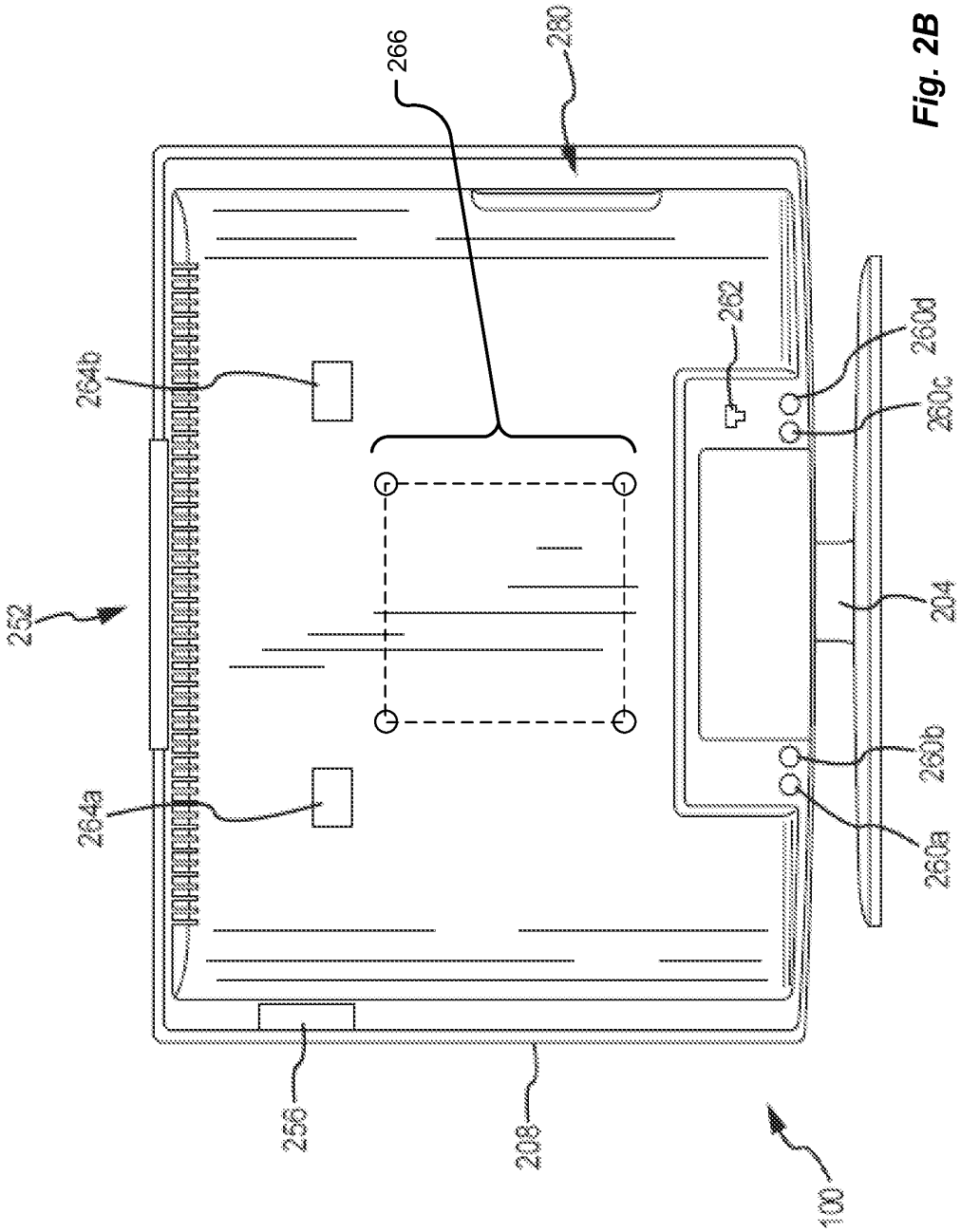



Fig. 2B

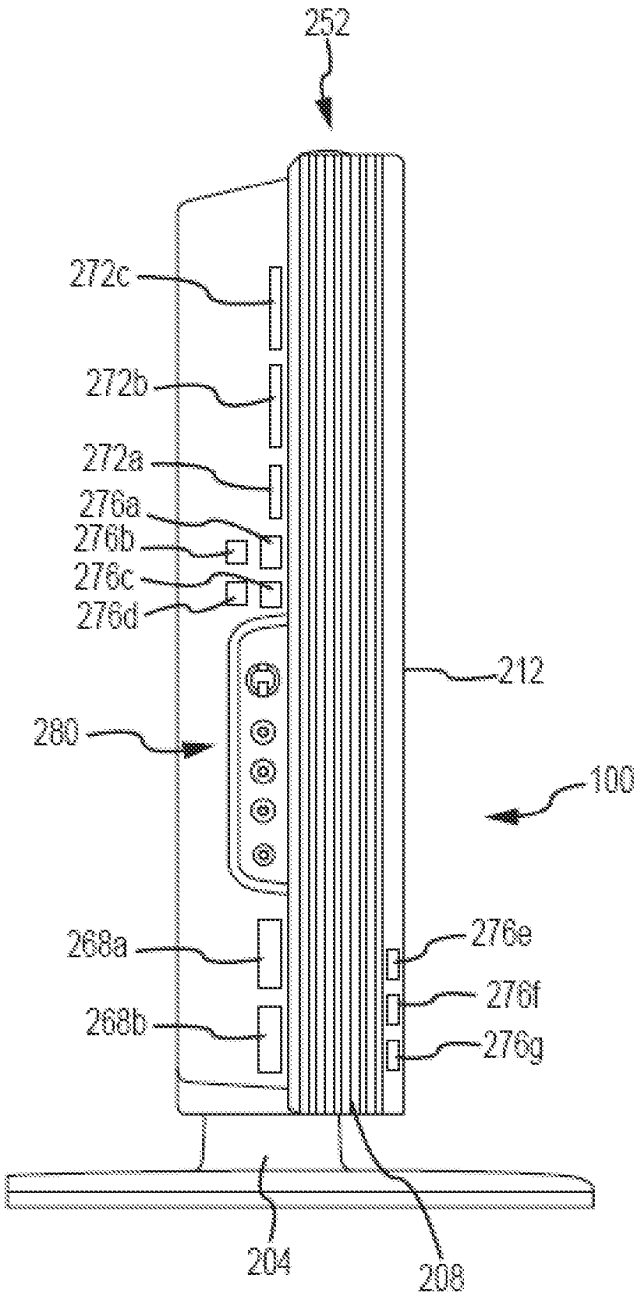

252
272c
272b
272a
276a
276b
276c
276d
212
280
100
268a
268b
276e
276f
276g
204
208

*Fig. 2C*

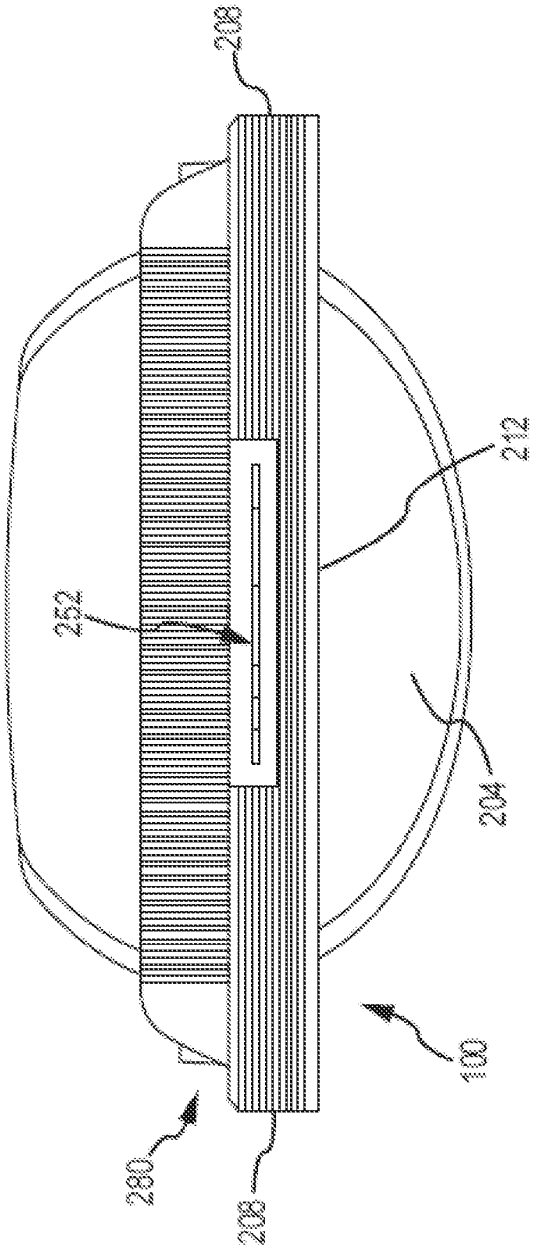



***Fig. 2D***

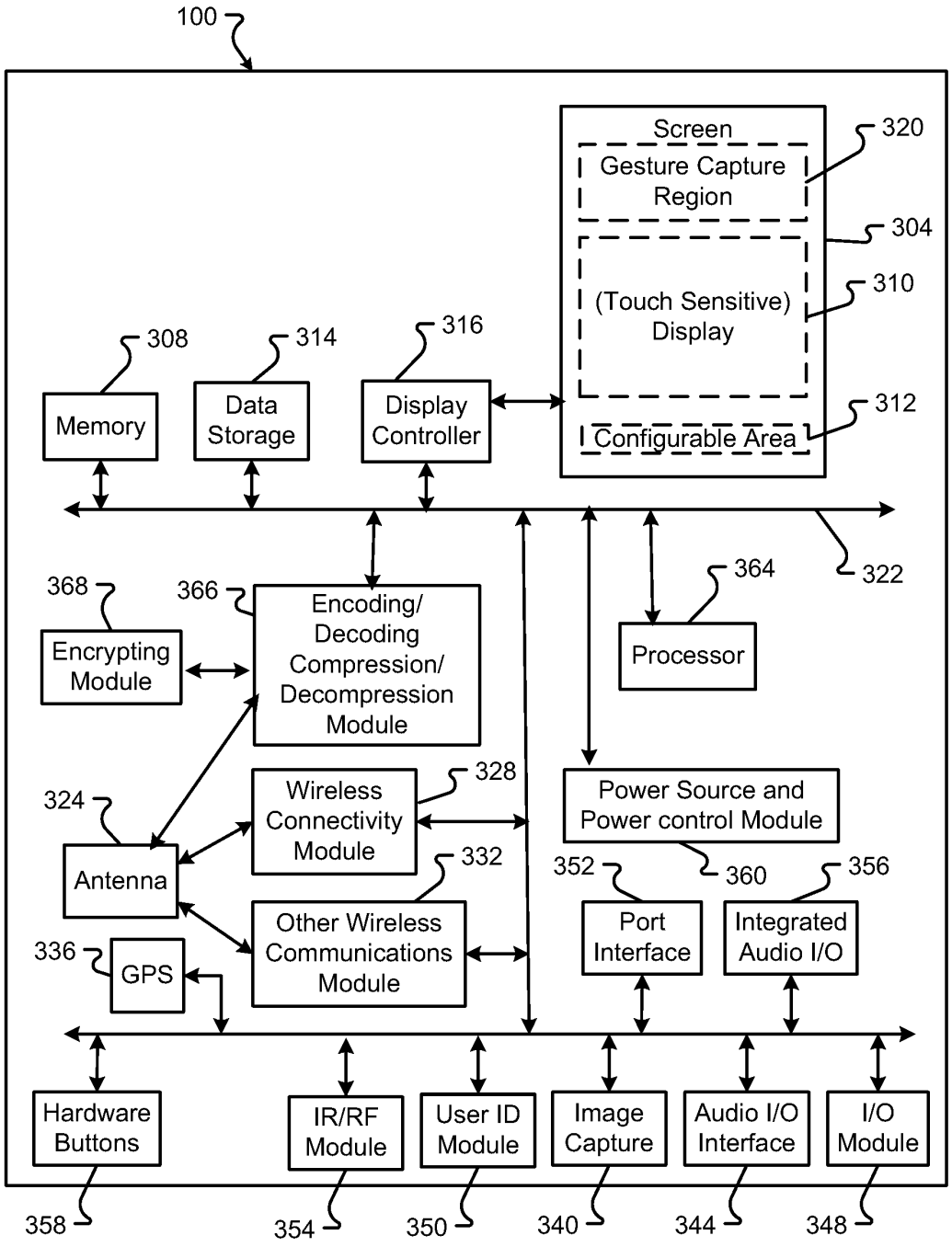

100
Screen
Gesture Capture Region
320
304
(Touch Sensitive) Display
310
312
Configurable Area
308
Memory
314
Data Storage
316
Display Controller
322
364
Processor
368
Encrypting Module
366
Encoding/ Decoding Compression/ Decompression Module
328
Wireless Connectivity Module
324
Antenna
332
Other Wireless Communications Module
336
GPS
Power Source and Power control Module
352
360
356
Port Interface
Integrated Audio I/O
Hardware Buttons
IR/RF Module
User ID Module
Image Capture
Audio I/O Interface
I/O Module
358
354
350
340
344
348

*FIG. 3*

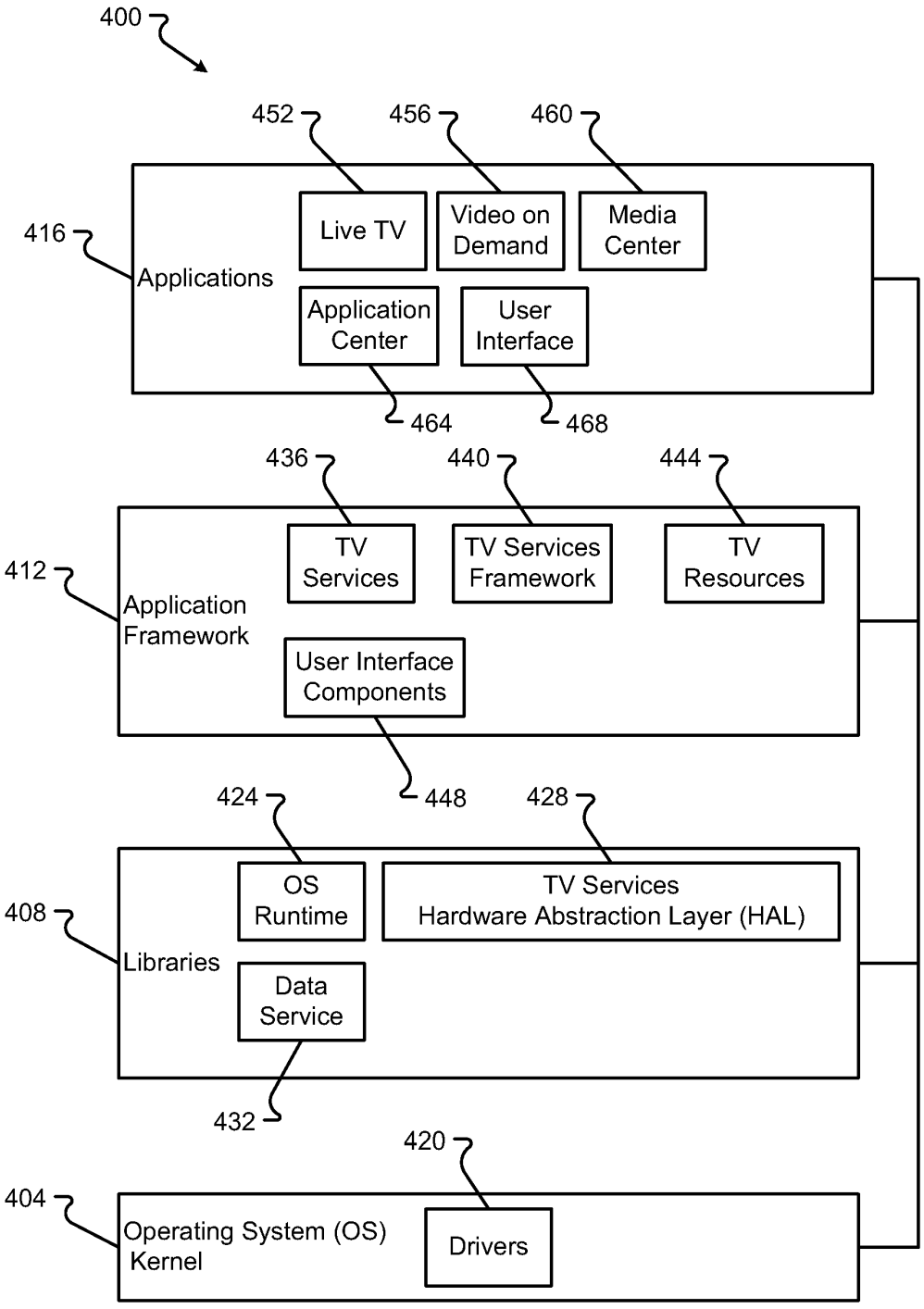

400
452
456
460
416
Applications
Live TV
Video on Demand
Media Center
Application Center
User Interface
464
468
436
440
444
412
Application Framework
TV Services
TV Services Framework
TV Resources
User Interface Components
448
424
428
408
Libraries
OS Runtime
TV Services Hardware Abstraction Layer (HAL)
Data Service
432
420
404
Operating System (OS) Kernel
Drivers

*FIG. 4*

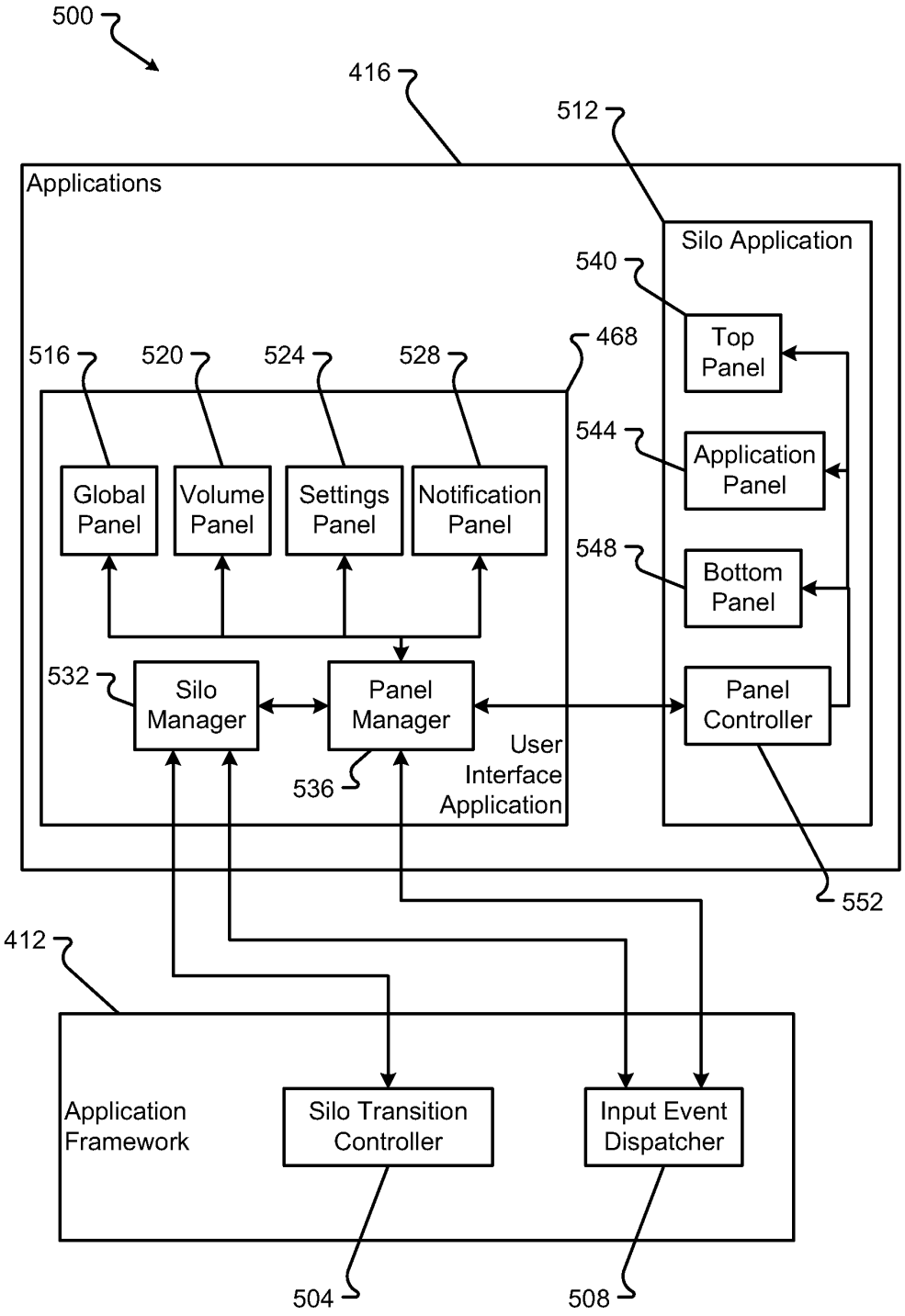

500
416
512
Applications
Silo Application
540
Top Panel
516
520
524
528
468
544
Application Panel
Global Panel
Volume Panel
Settings Panel
Notification Panel
548
Bottom Panel
532
Silo Manager
Panel Manager
Panel Controller
User Interface Application
536
552
412
Application Framework
Silo Transition Controller
Input Event Dispatcher
504
508

*FIG. 5*

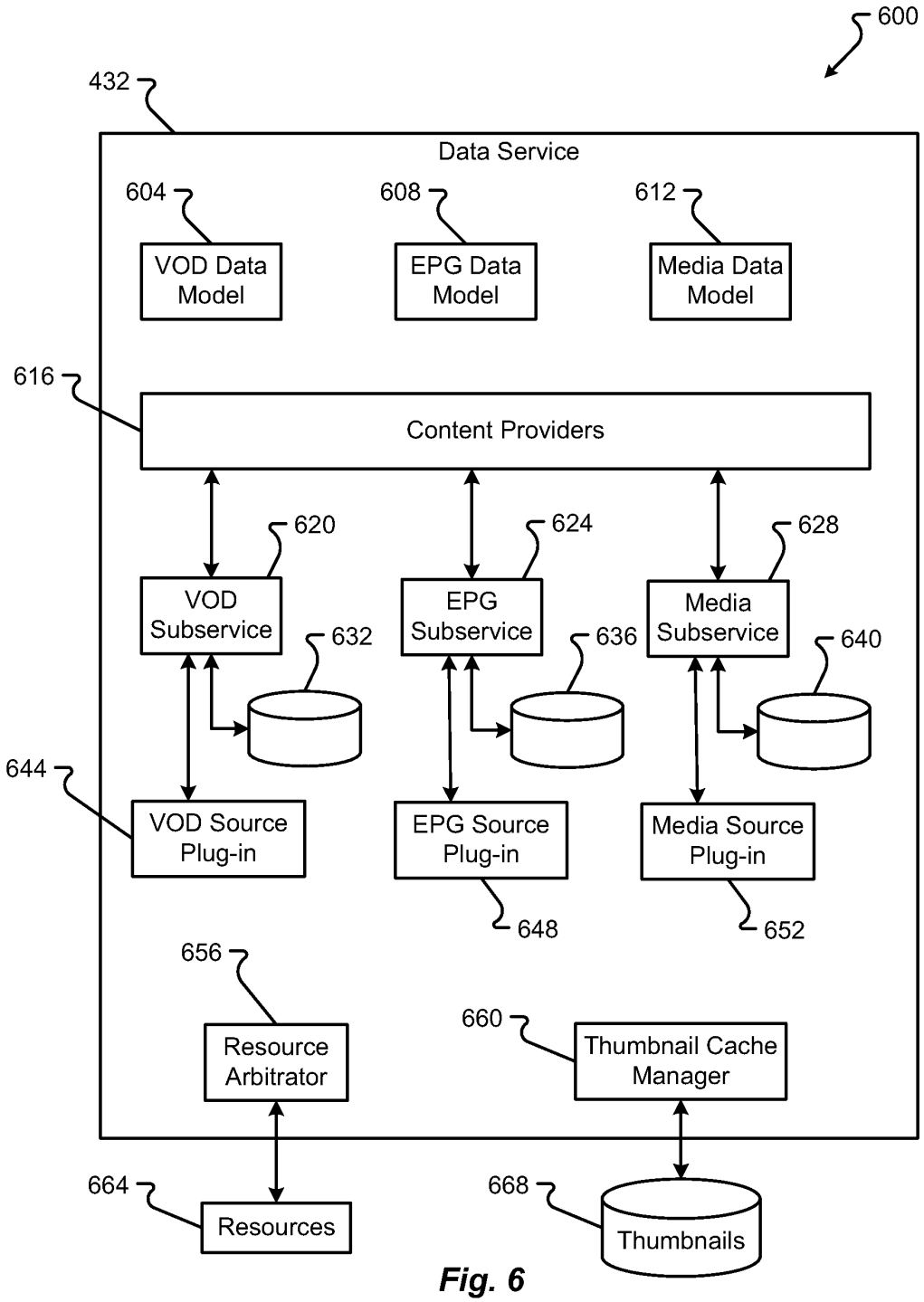

600
432
Data Service
604
VOD Data Model
608
EPG Data Model
612
Media Data Model
616
Content Providers
620
VOD Subservice
624
EPG Subservice
628
Media Subservice
632
636
640
644
VOD Source Plug-in
EPG Source Plug-in
Media Source Plug-in
648
652
656
Resource Arbitrator
660
Thumbnail Cache Manager
664
Resources
668
Thumbnails

***Fig. 6***

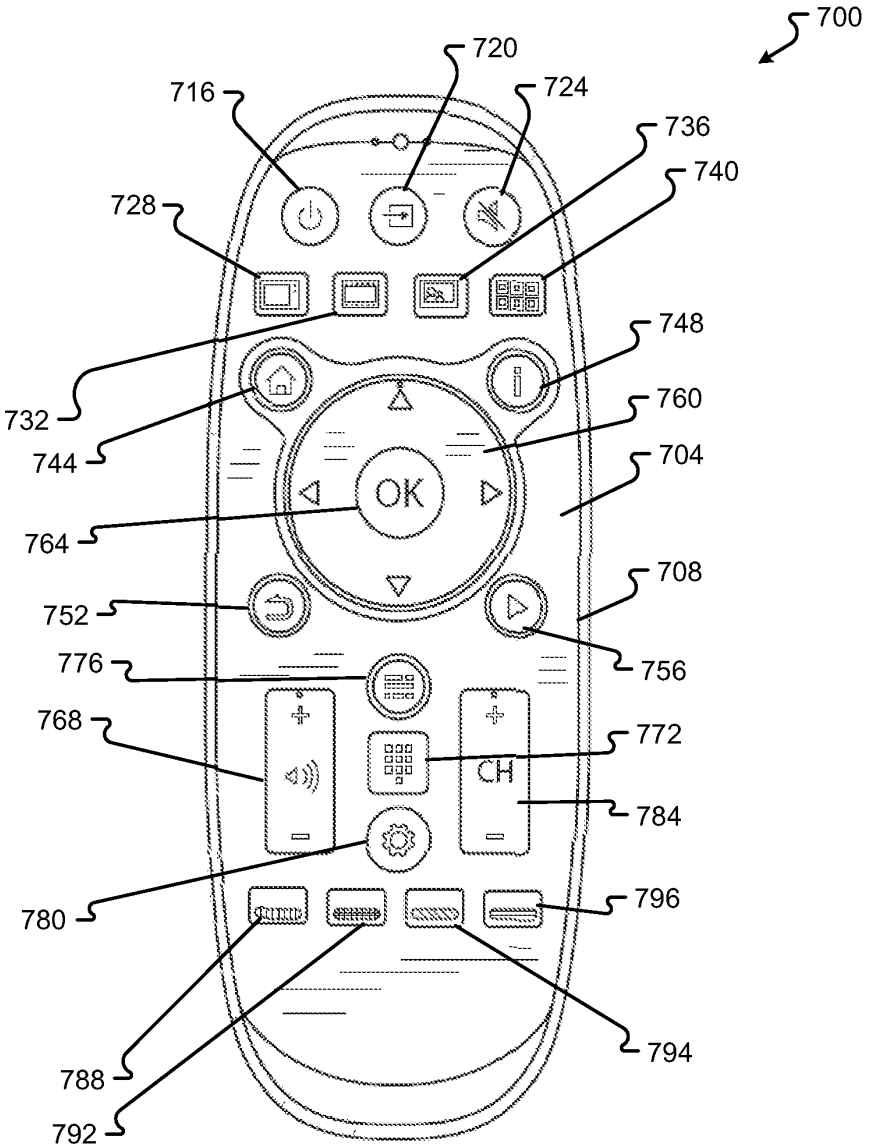

700
720
716
724
736
740
728
748
732
760
744
704
OK
764
708
752
776
756
768
772
CH
784
780
796
788
794
792

***Fig. 7***

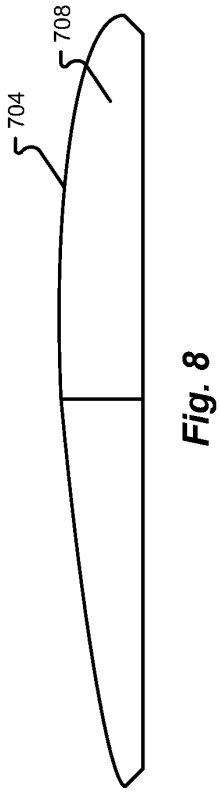



Fig. 8

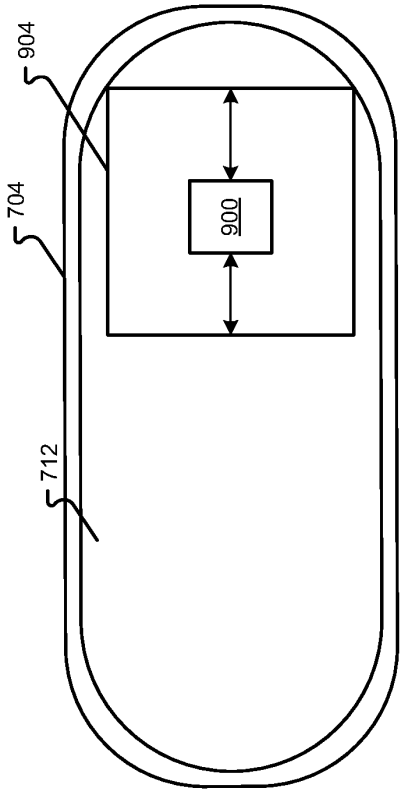



Fig. 9A

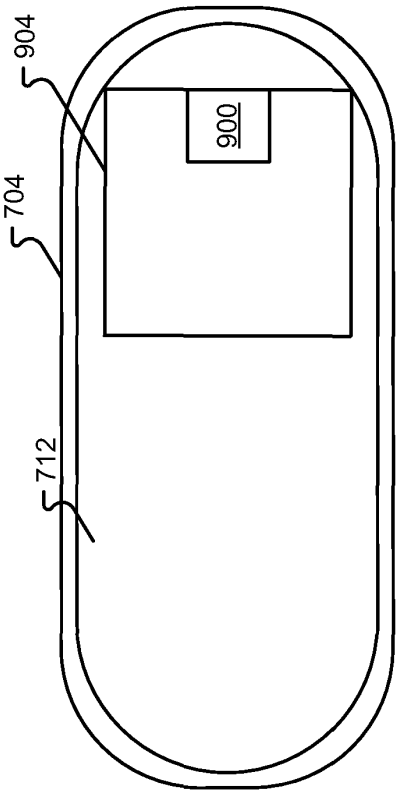



Fig. 9B

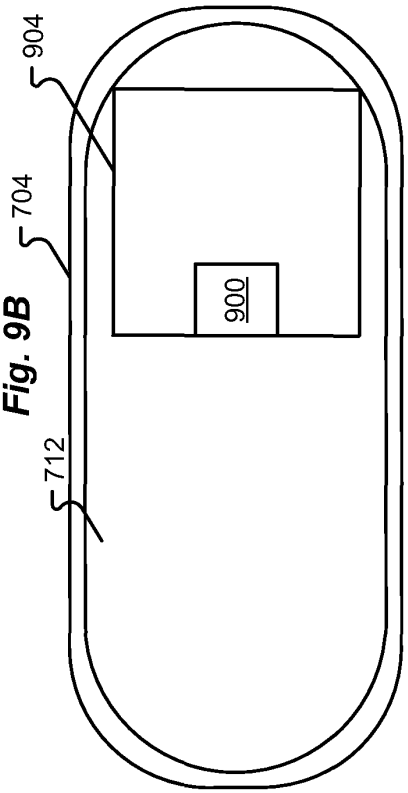



Fig. 9C

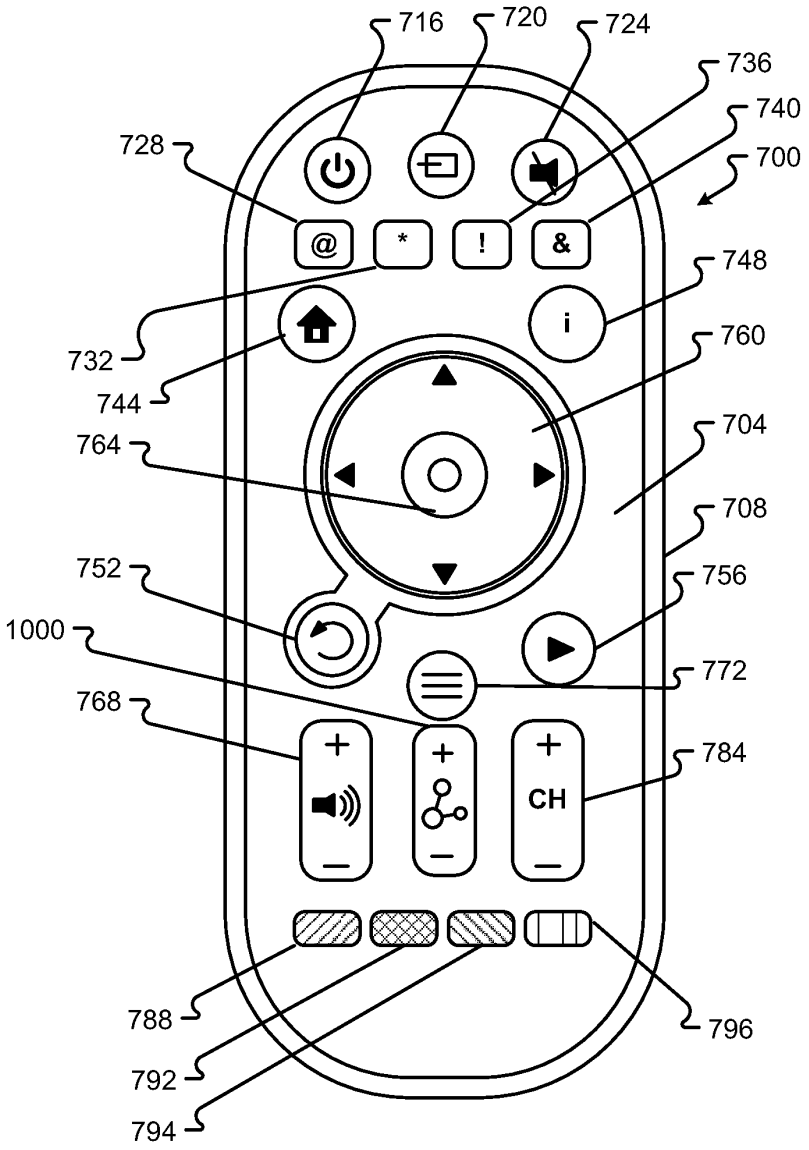

716
720
724
736
740
700
728
@
*
!
&
748
i
732
744
760
764
704
708
752
756
1000
772
768
784
CH
788
792
794
796

*Fig. 10*

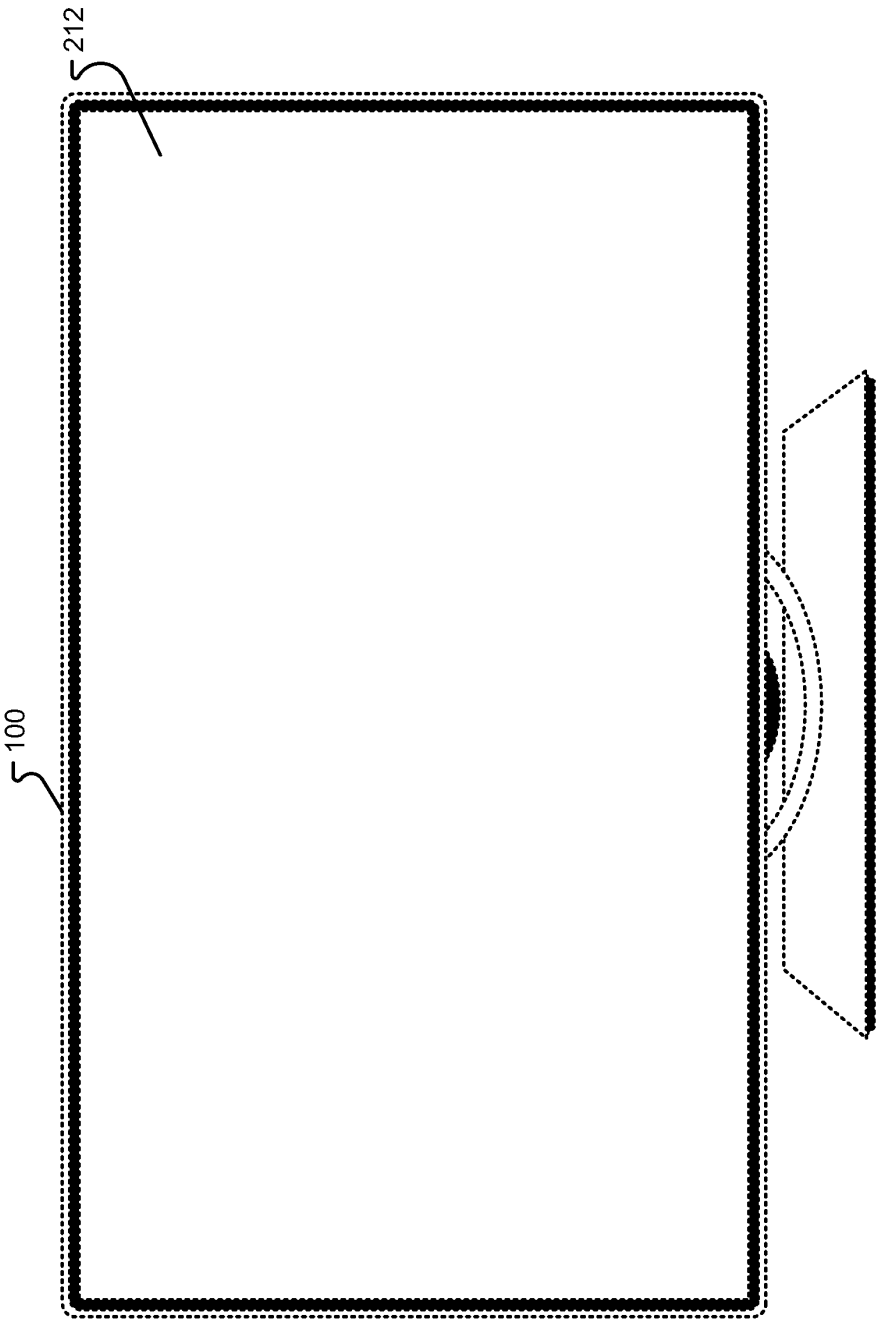



*Fig. 11A*

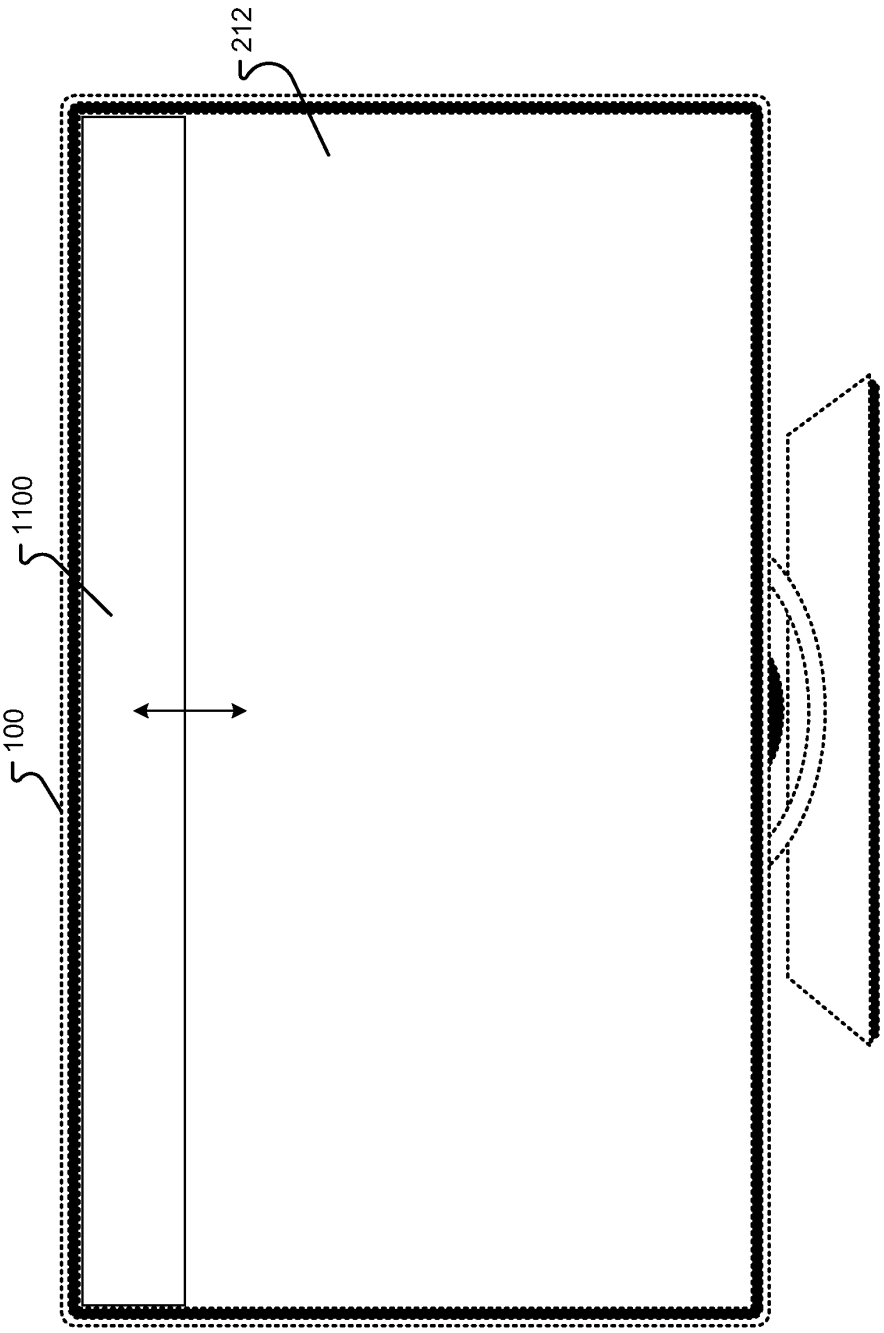



Fig. 11B

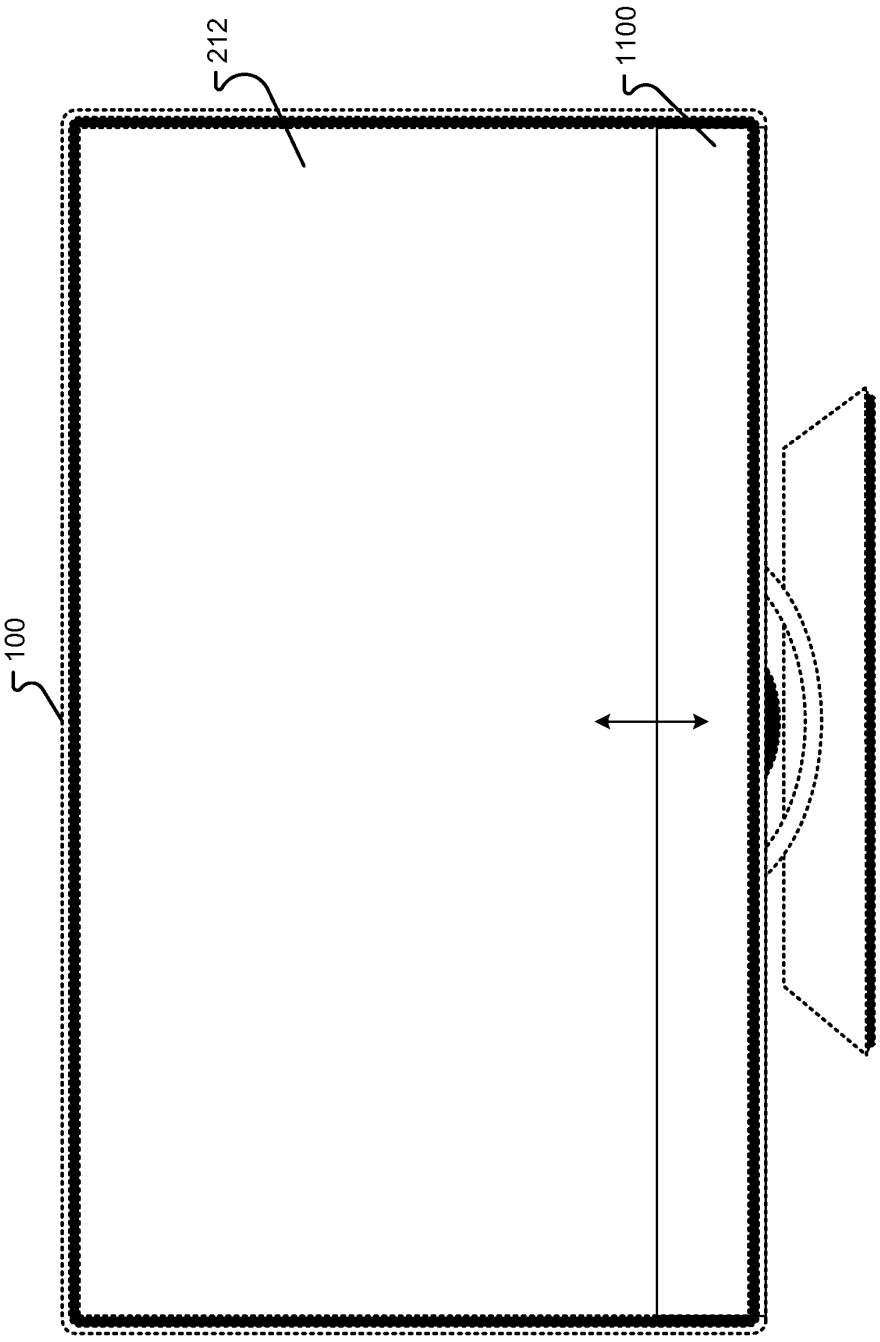



Fig. 11C

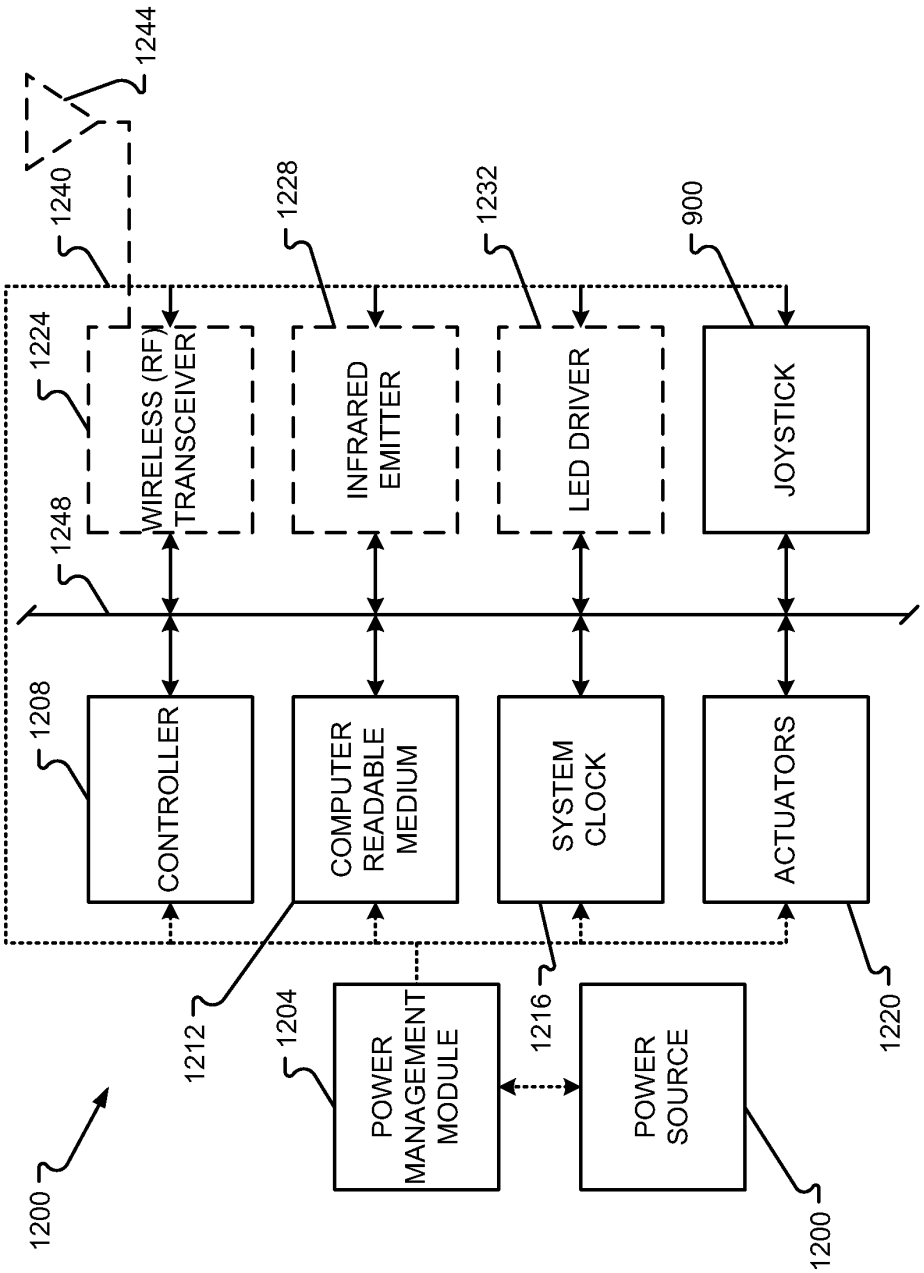

1244
1240
1228
1232
900
1224
WIRELESS (RF) TRANSCEIVER
INFRARED EMITTER
LED DRIVER
JOYSTICK
1248
1208
CONTROLLER
COMPUTER READABLE MEDIUM
SYSTEM CLOCK
ACTUATORS
1212
1204
POWER MANAGEMENT MODULE
1216
POWER SOURCE
1220
1200
1200

*Fig. 12*

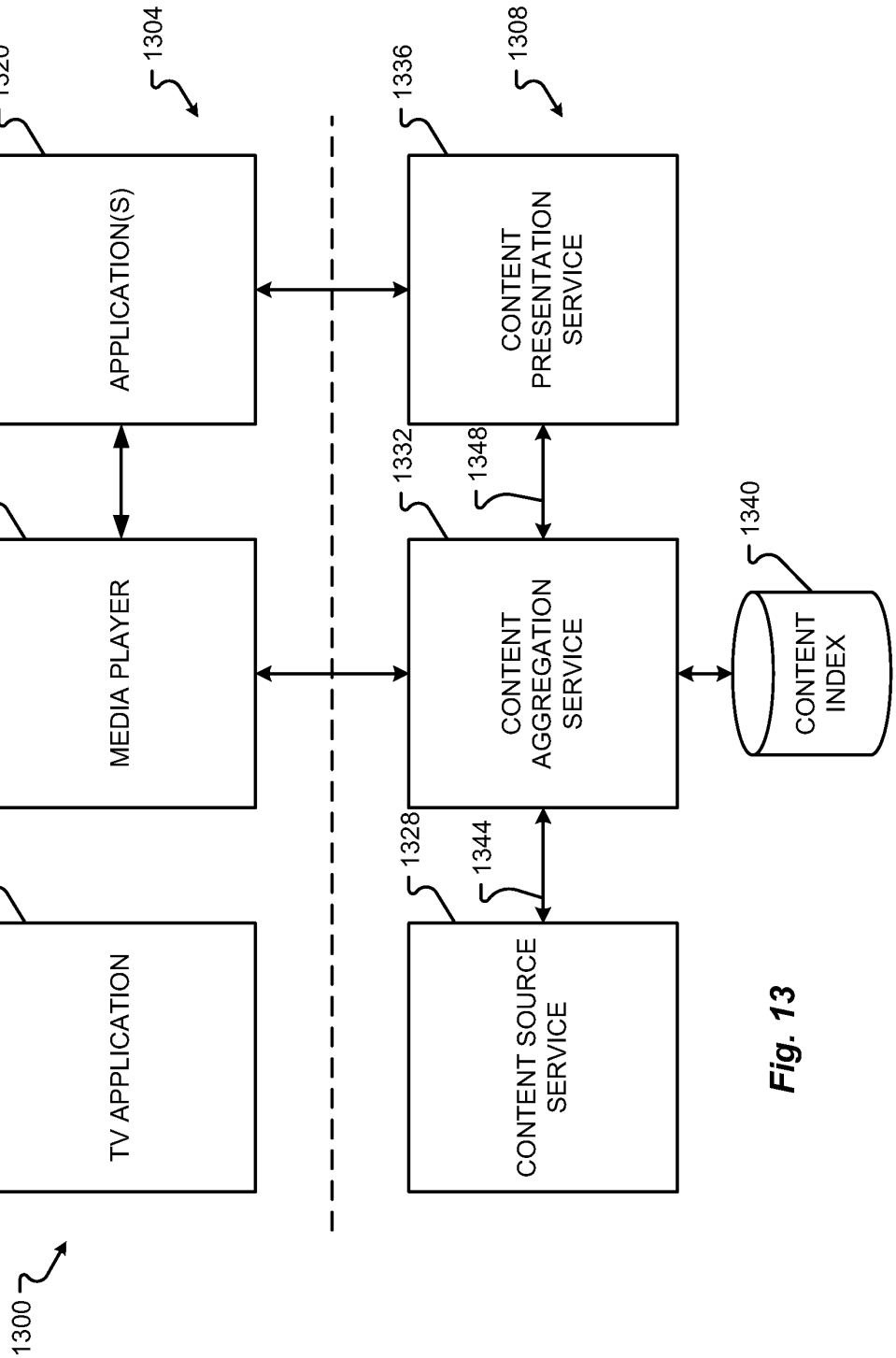

1300
1304
1308
1312
1316
1320
1328
1332
1336
1340
1344
1348
APPLICATION(S)
MEDIA PLAYER
TV APPLICATION
CONTENT PRESENTATION SERVICE
CONTENT AGGREGATION SERVICE
CONTENT SOURCE SERVICE
CONTENT INDEX

*Fig. 13*

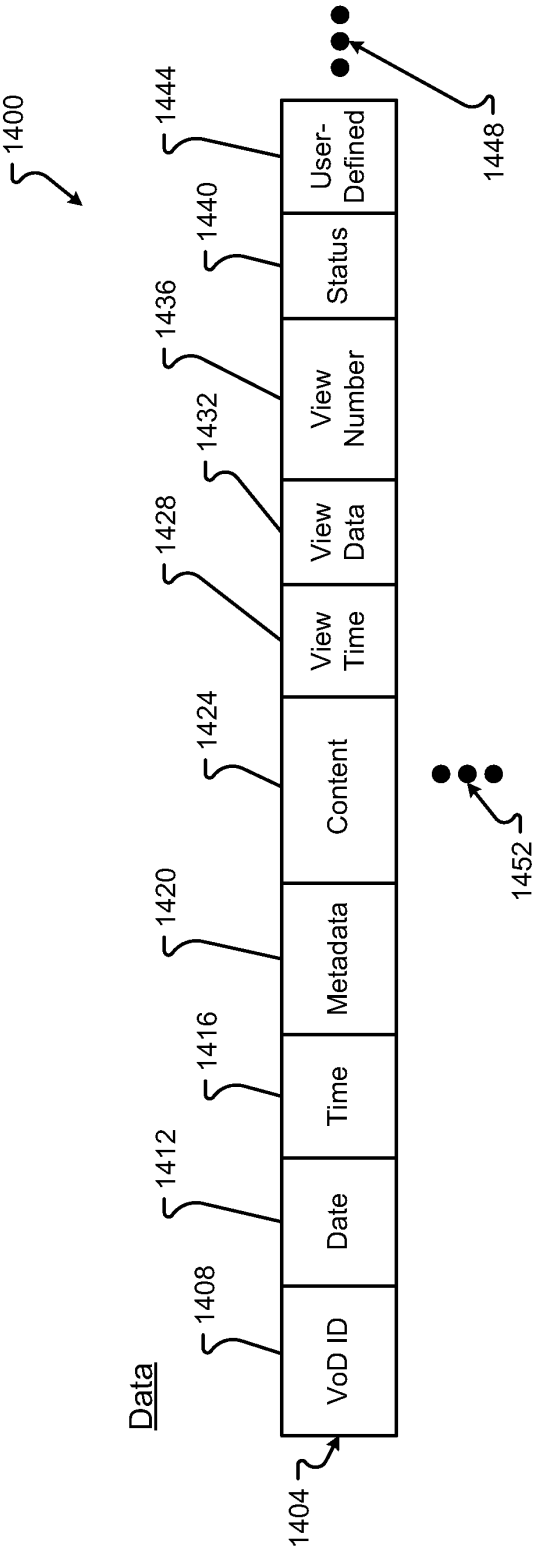

1400
Data
VoD ID
Date
Time
Metadata
Content
View Time
View Data
View Number
Status
User-Defined
1404
1408
1412
1416
1420
1424
1428
1432
1436
1440
1444
1448
1452

*Fig. 14*

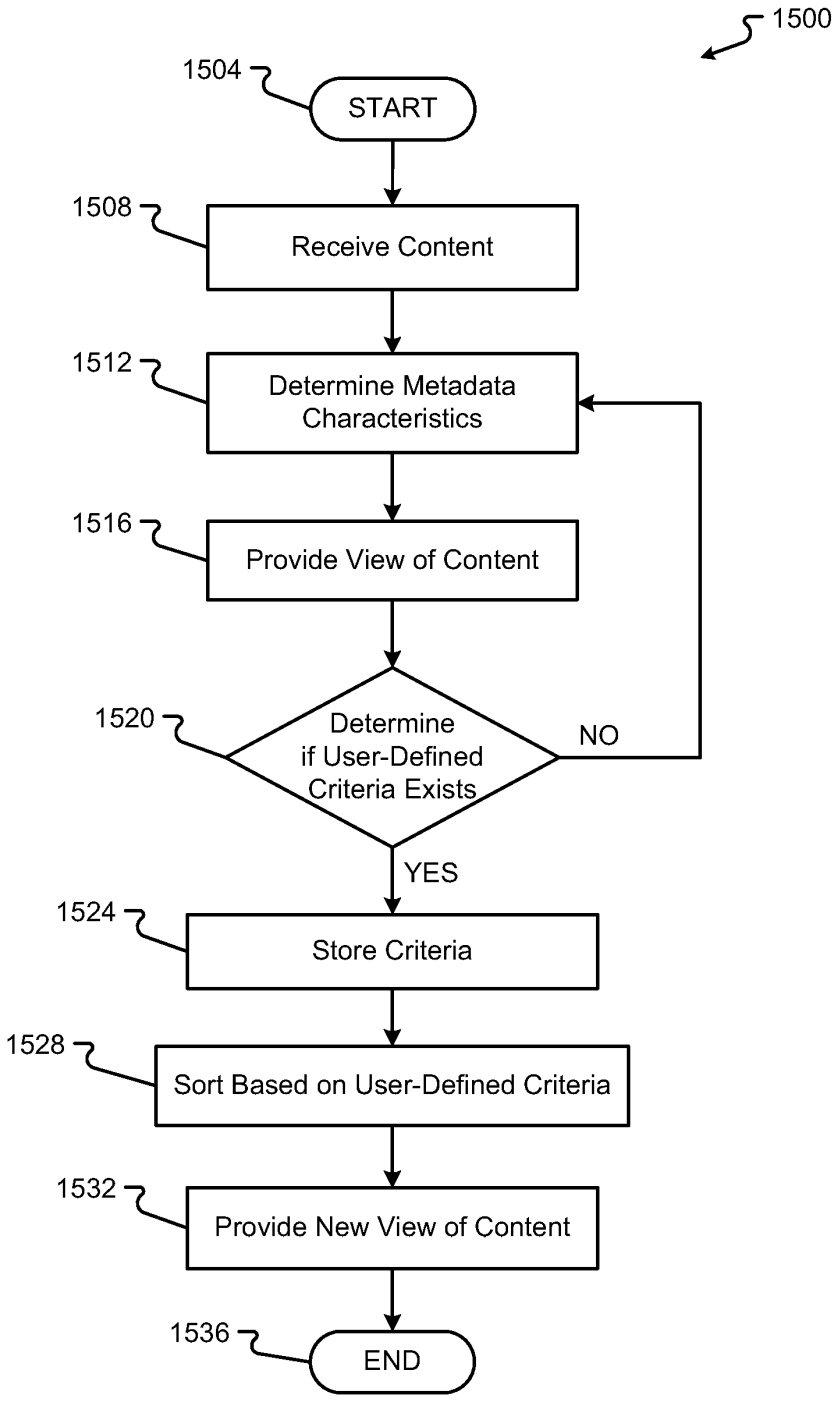

1500
1504
START
1508
Receive Content
1512
Determine Metadata Characteristics
1516
Provide View of Content
1520
Determine if User-Defined Criteria Exists
NO
YES
1524
Store Criteria
1528
Sort Based on User-Defined Criteria
1532
Provide New View of Content
1536
END

***Fig. 15***

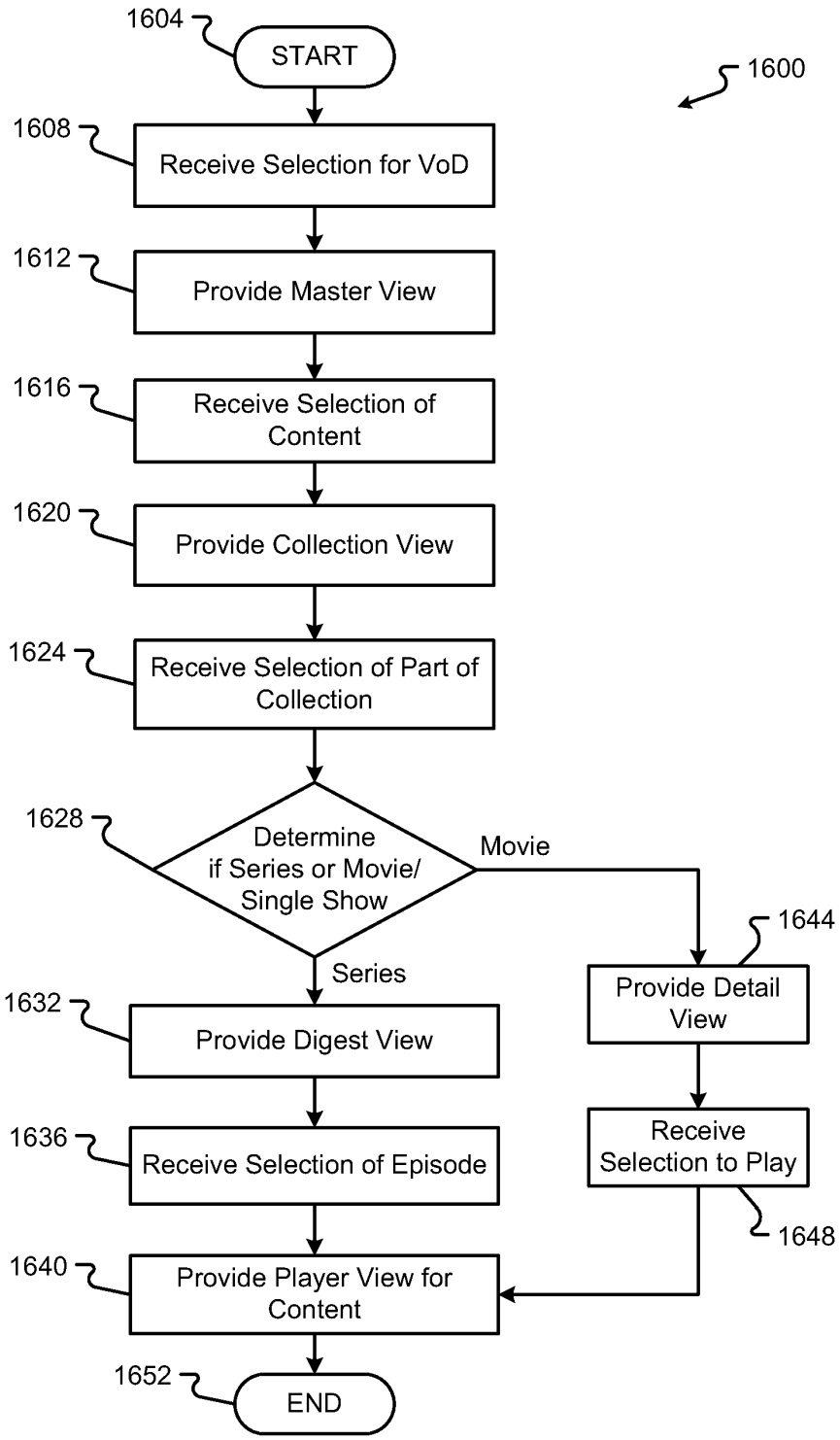

1604
START
1600
1608
Receive Selection for VoD
1612
Provide Master View
1616
Receive Selection of Content
1620
Provide Collection View
1624
Receive Selection of Part of Collection
1628
Determine if Series or Movie/ Single Show
Movie
Series
1644
Provide Detail View
1632
Provide Digest View
1636
Receive Selection of Episode
Receive Selection to Play
1648
1640
Provide Player View for Content
1652
END

***Fig. 16***

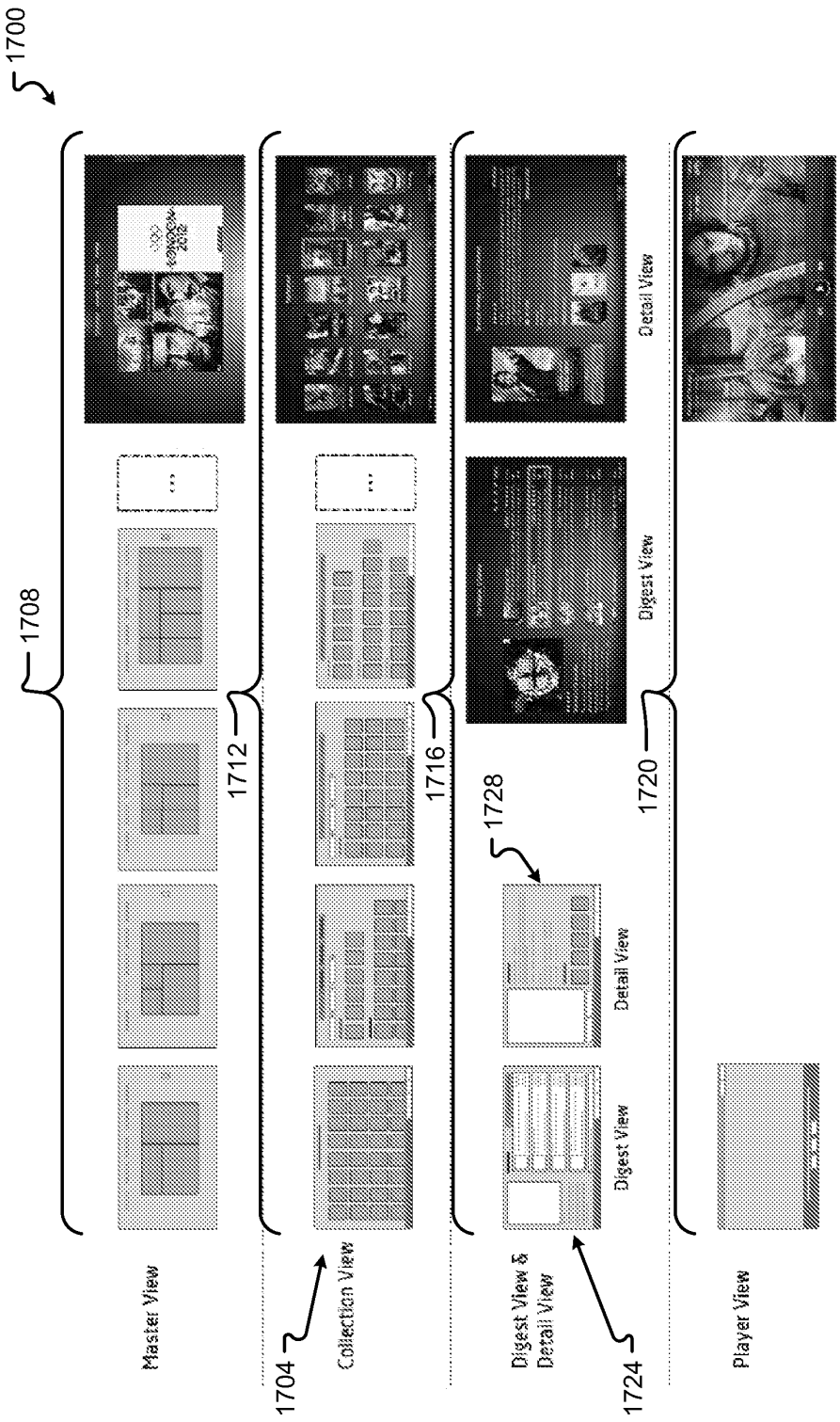

1700
1708
1712
1716
1720
1704
1724
1728
Master View
Collection View
Digest View & Detail View
Player View
Digest View
Detail View
Digest View
Detail View

*Fig. 17*

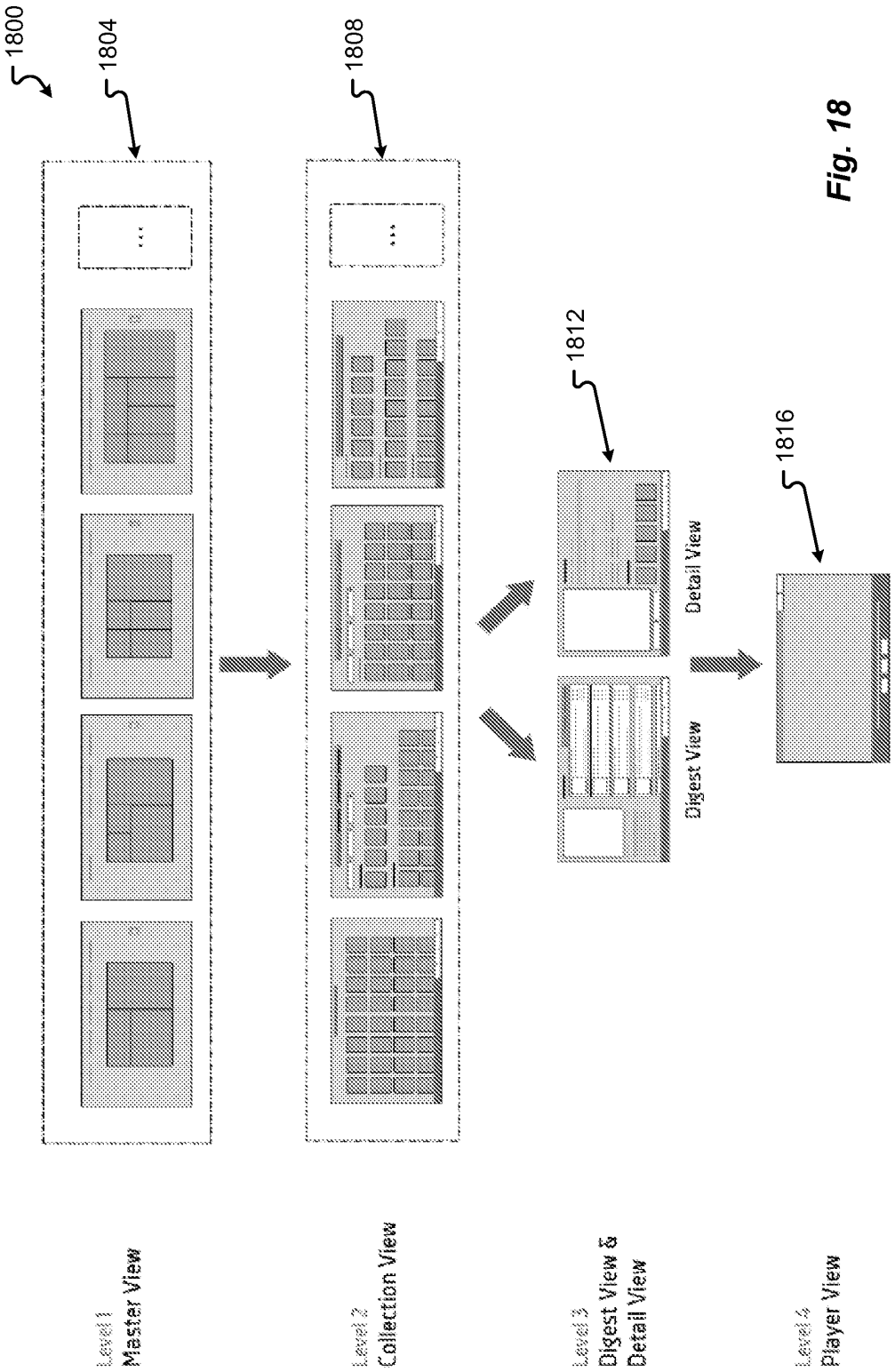

1800
1804
1808
1812
1816
Detail View
Digest View
Level 1
Master View
Level 2
Collection View
Level 3
Digest View &
Detail View
Level 4
Player View

*Fig. 18*

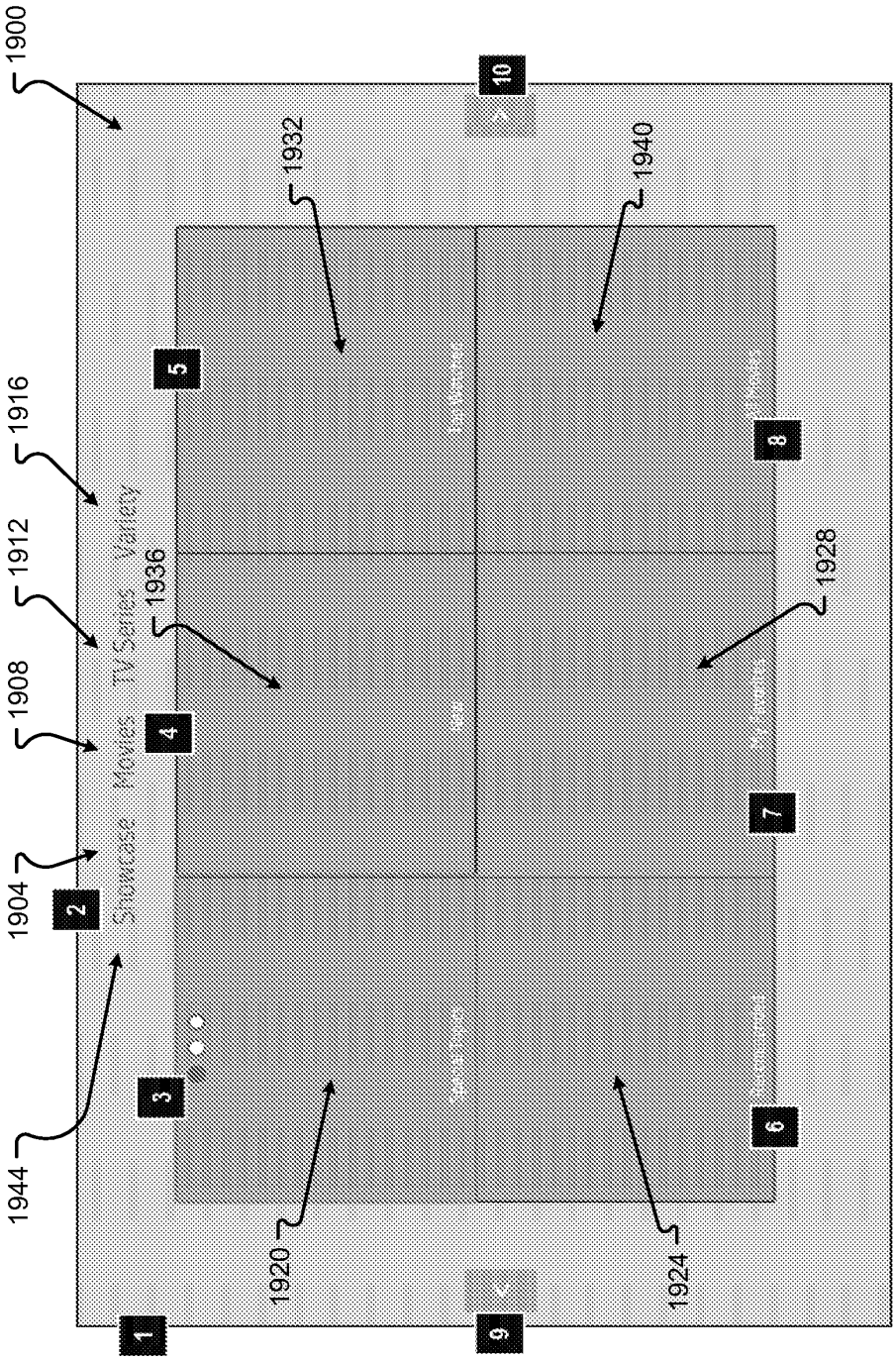

1900
1916
1912
1908
1904
1944
1932
1940
1936
1928
1920
1924
Showcase
Movies
TV Series
Variety
1
2
3
4
5
6
7
8
9
10

*Fig. 19*

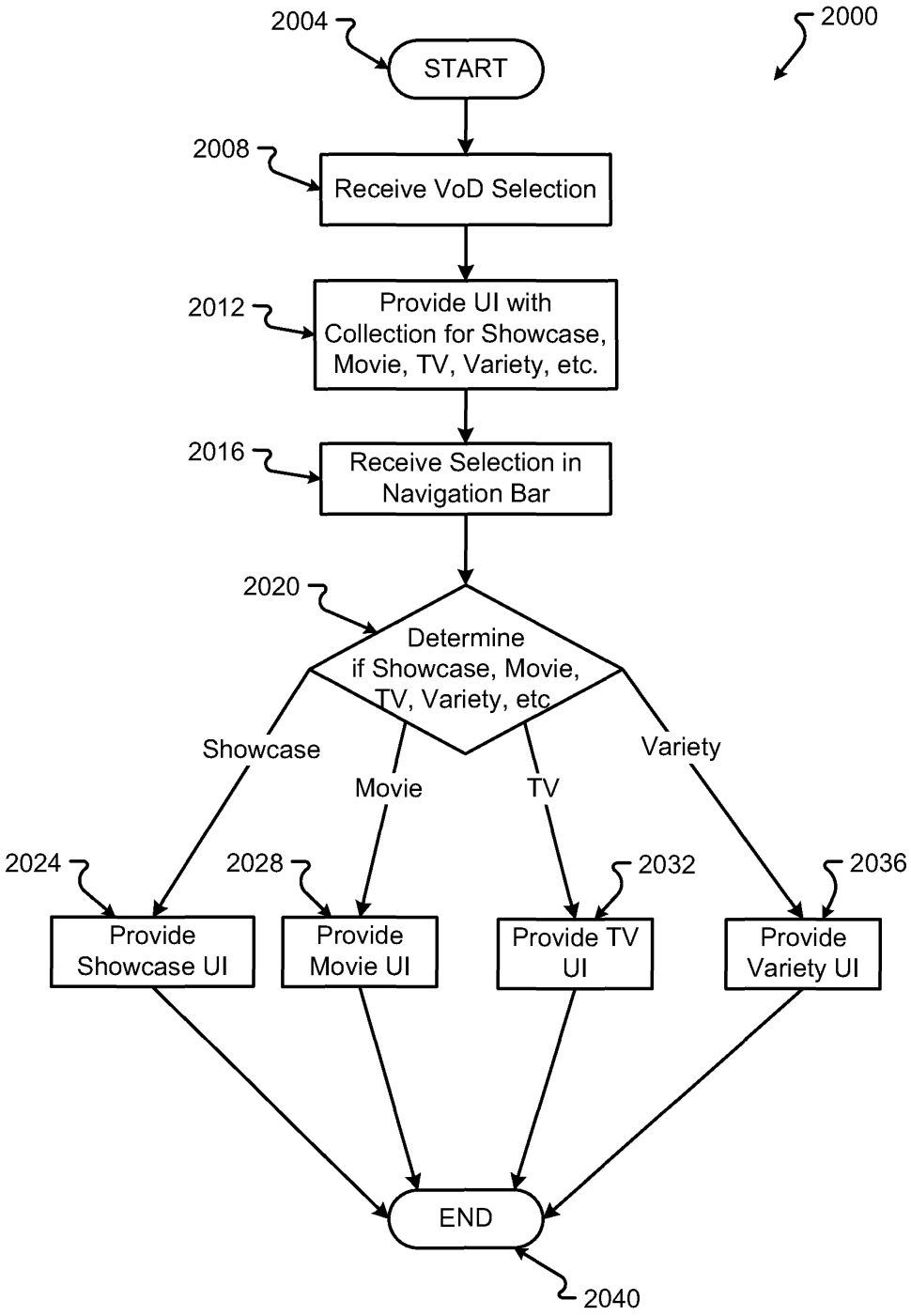

2004
START
2000
2008
Receive VoD Selection
2012
Provide UI with Collection for Showcase, Movie, TV, Variety, etc.
2016
Receive Selection in Navigation Bar
2020
Determine if Showcase, Movie, TV, Variety, etc.
Showcase
Movie
TV
Variety
2024
2028
2032
2036
Provide Showcase UI
Provide Movie UI
Provide TV UI
Provide Variety UI
END
2040

***Fig. 20***

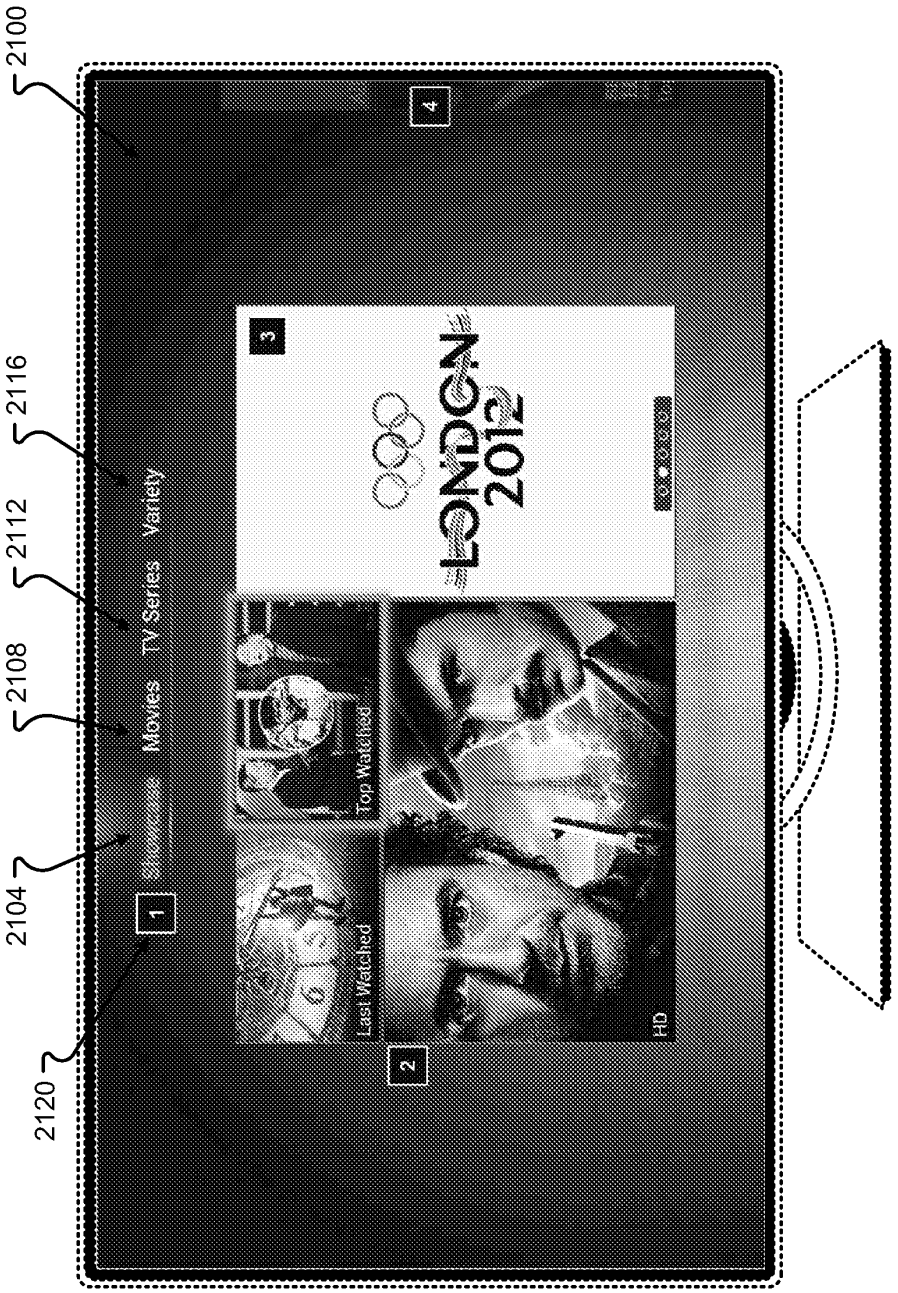

2100
2116
2112
2108
2104
2120
Movies
TV Series
Variety
1
2
3
4
Last Watched
Top Watched
HD
LONDON
2012

*Fig. 21*

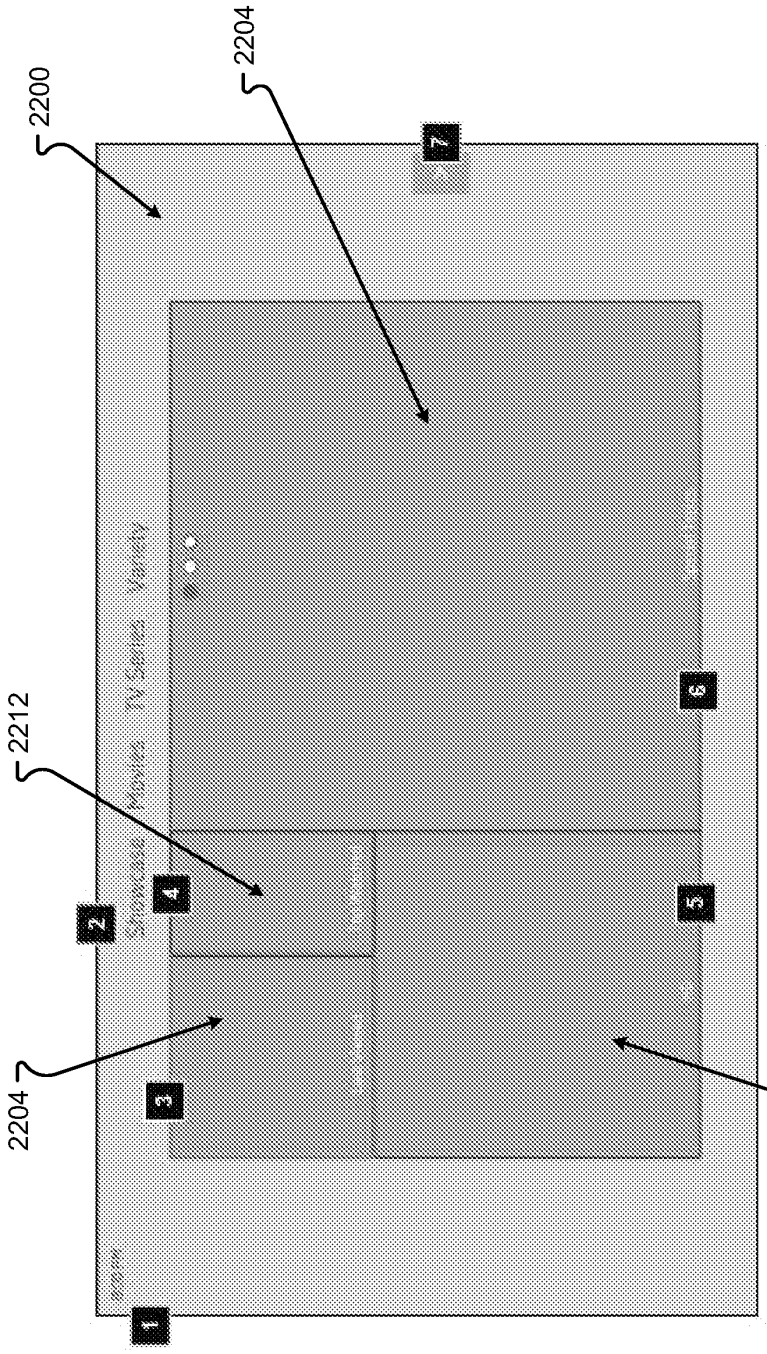



*Fig. 22*

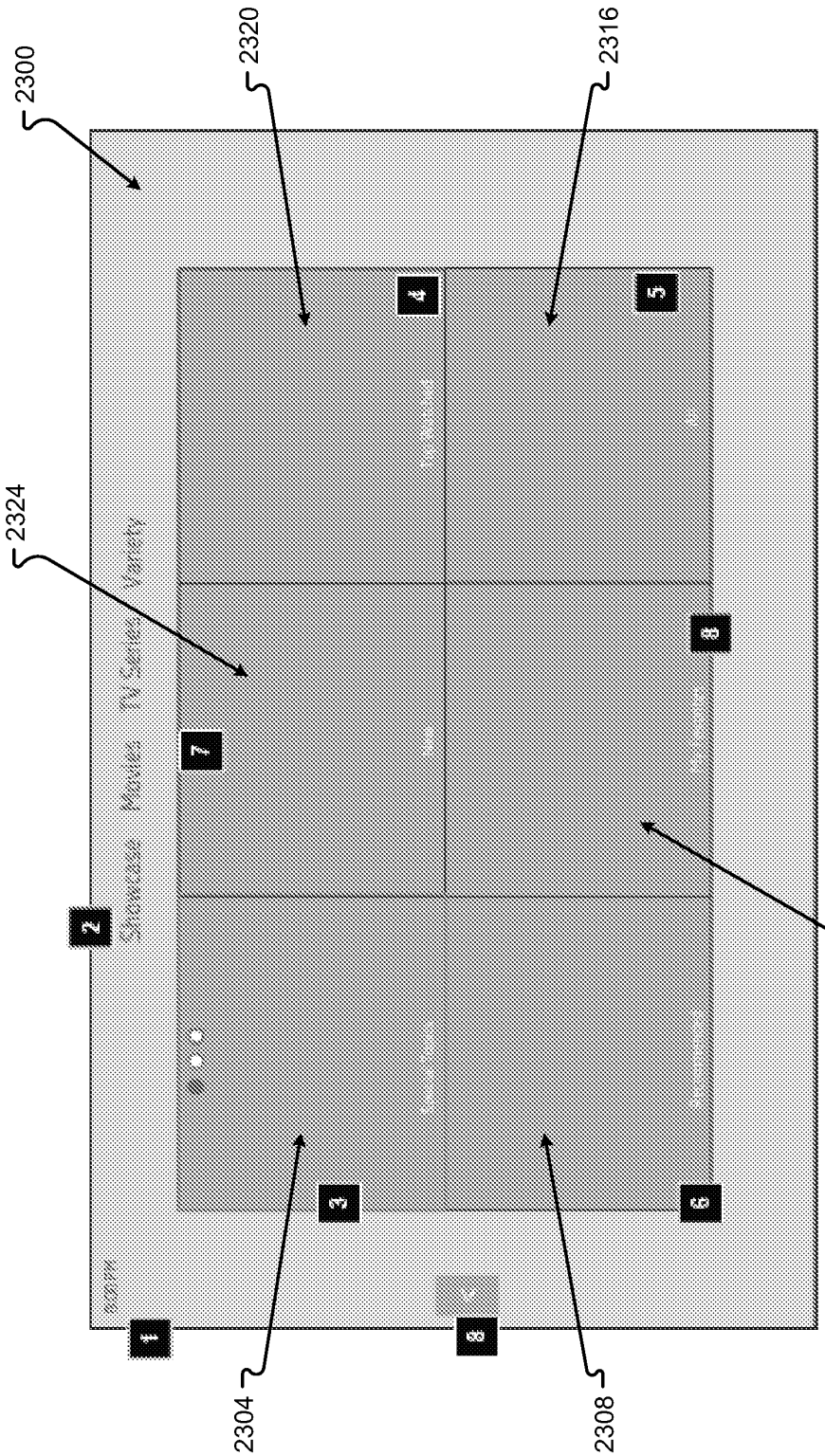



*Fig. 23*

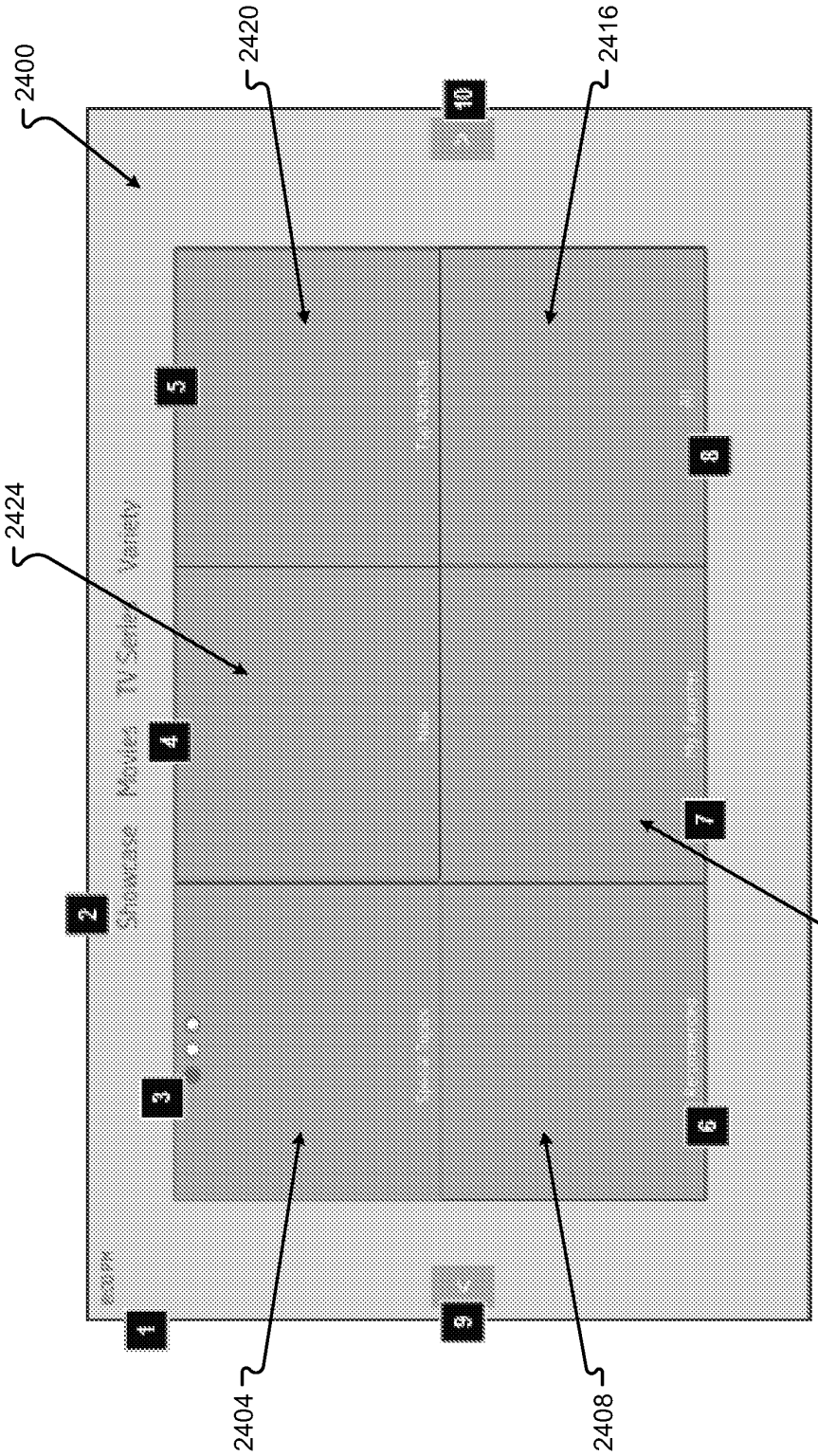



*Fig. 24*

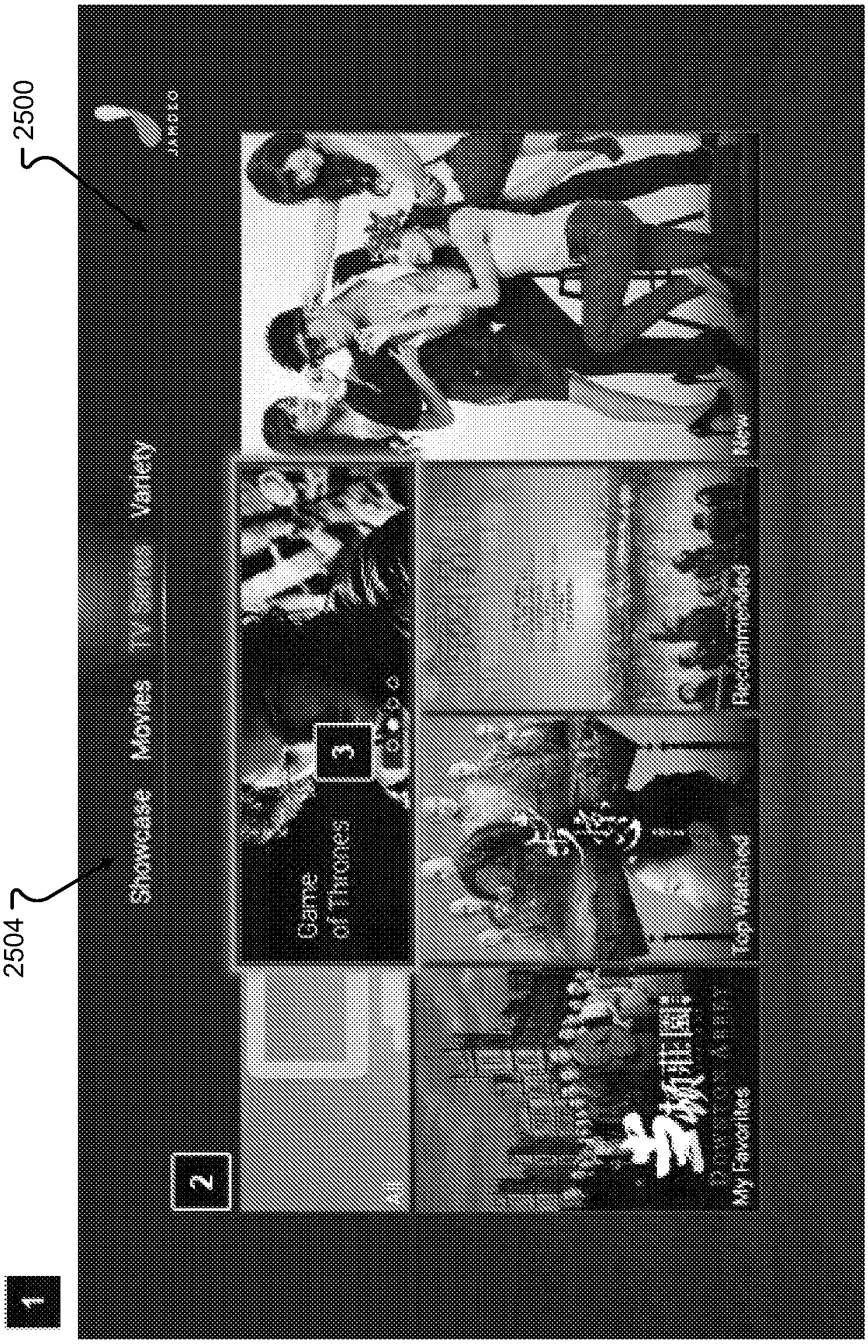

2500
2504
1
2
3
Showcase
Movies
Variety
Game of Thrones
My Favorites
Recommended
New

*Fig. 25*

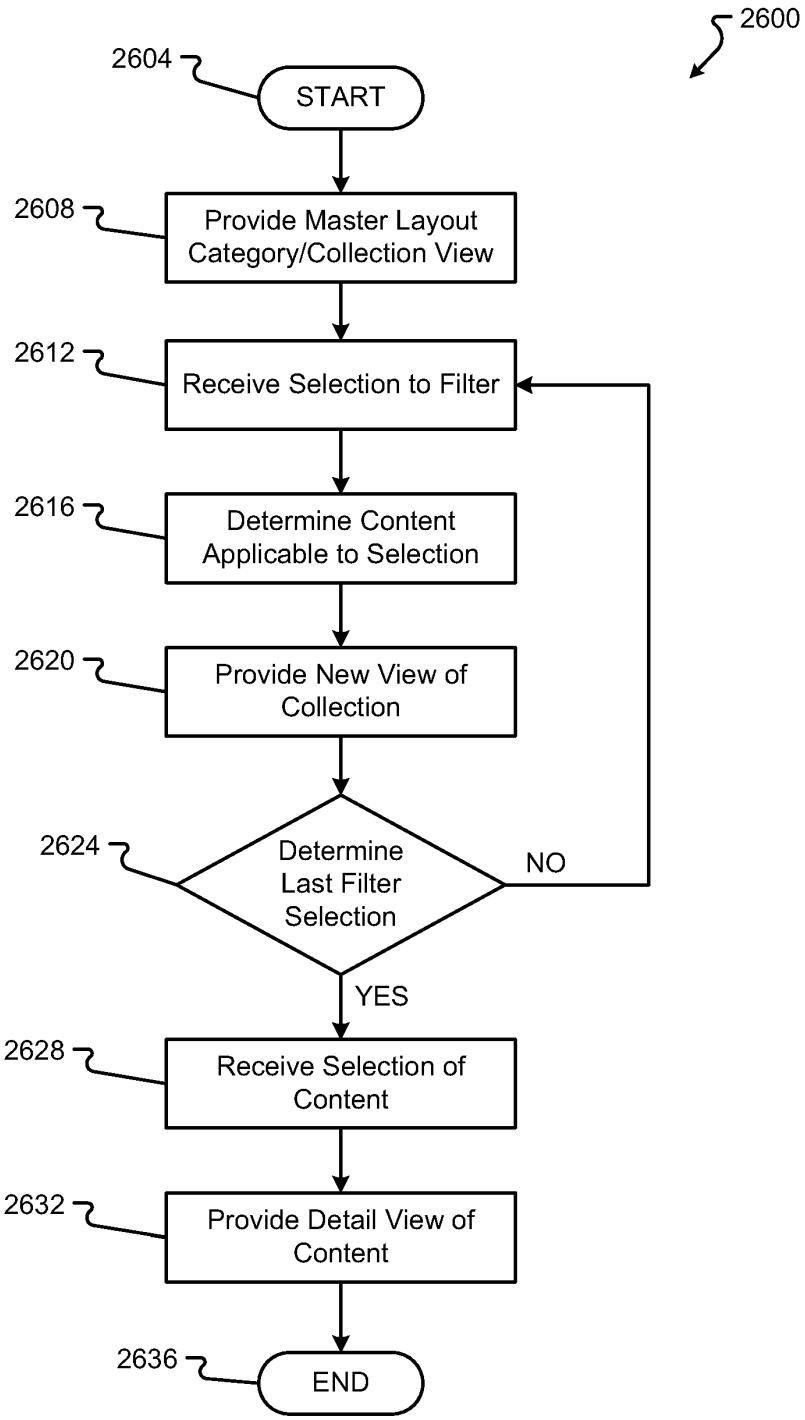

2600
2604
START
2608
Provide Master Layout Category/Collection View
2612
Receive Selection to Filter
2616
Determine Content Applicable to Selection
2620
Provide New View of Collection
2624
Determine Last Filter Selection
NO
YES
2628
Receive Selection of Content
2632
Provide Detail View of Content
2636
END

***Fig. 26***

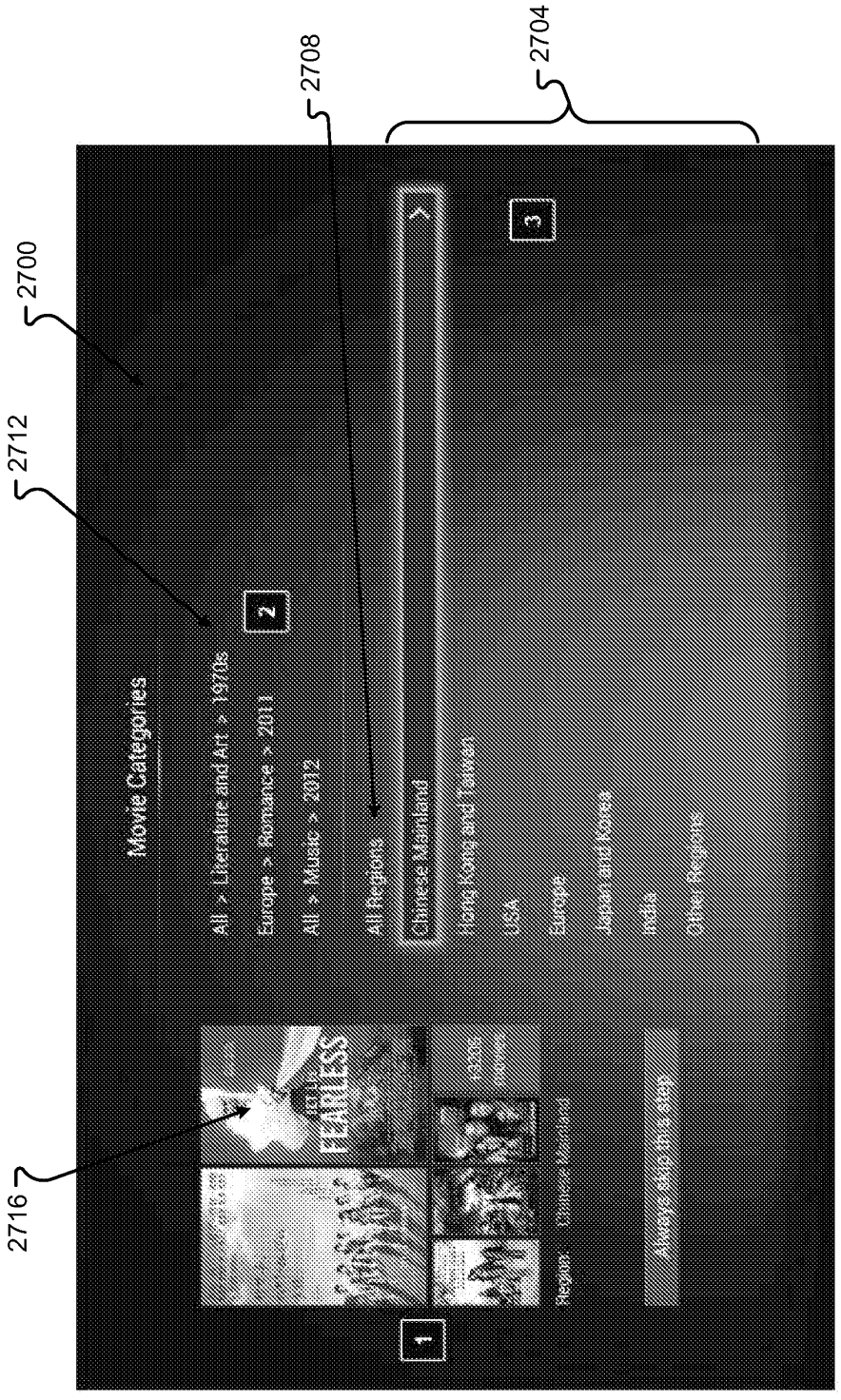

2700
2712
2716
2708
2704
Movie Categories
All > Literature and Art > 1970s
Europe > Romance > 2011
All > Music > 2012
All Regions
Chinese Mainland
Hong Kong and Taiwan
USA
Europe
Japan and Korea
India
Other Regions
FEARLESS
1
2
3

*Fig. 27A*

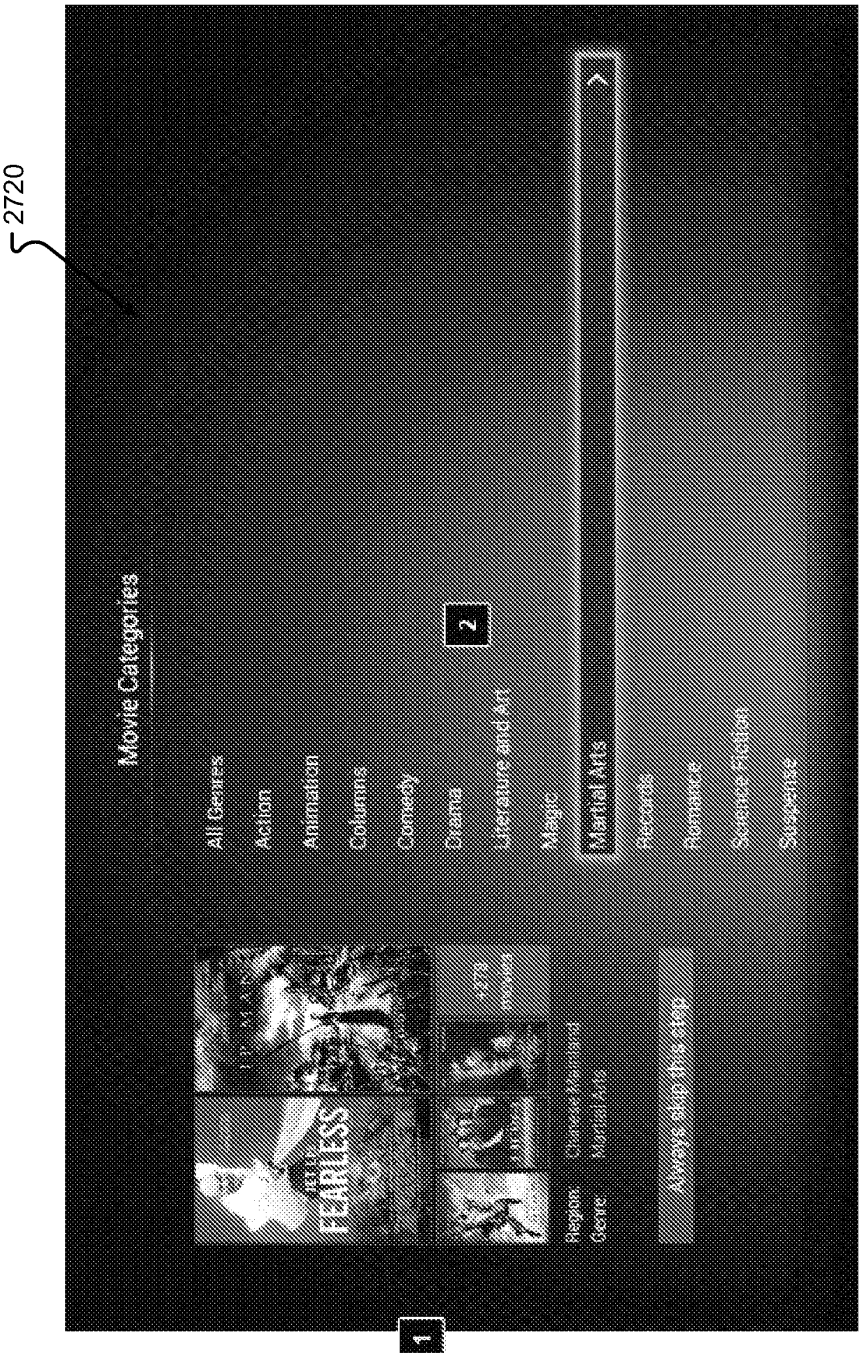

2720
Movie Categories
All Genres
Action
Animation
Cdrama
Comedy
Drama
Literature and Art
Magic
Martial Arts
Romance
Science Fiction
Suspense
1
2

*Fig. 27B*

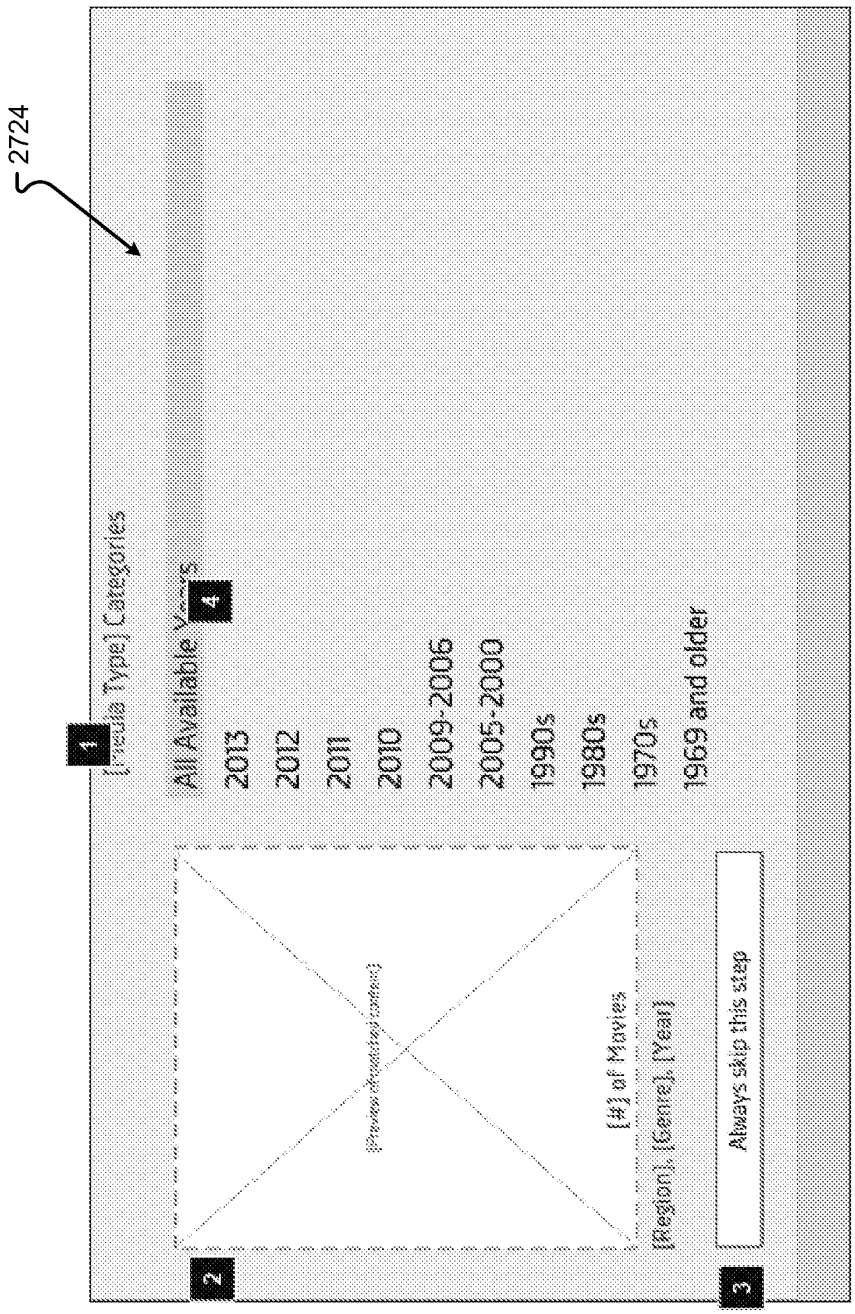

2724
1
[Media Type] Categories
2
All Available Years
4
2013
2012
2011
2010
2009-2006
2005-2000
1990s
1980s
1970s
1969 and older
[#] of Movies
[Region], [Genre], [Year]
3
Always skip this step

*Fig. 27C*

Collection View
2800
Collection View Filter Bar
Filter
Filter 1
Filter 2
Filter 3
2804
Examples
United States
Boston
2012
England

*Fig. 28*

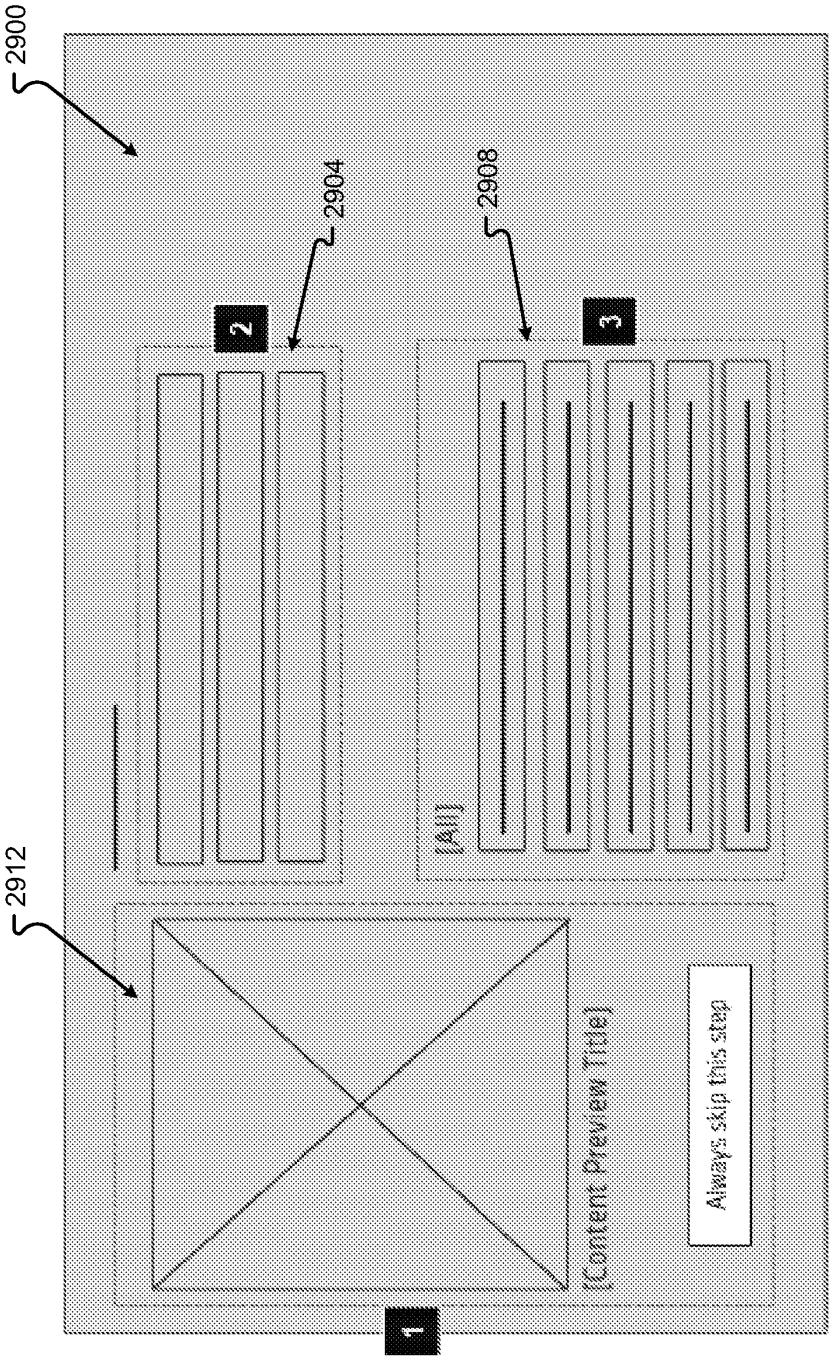

2900
2904
2908
2912
2
3
1
[All]
[Content Preview Title]
Always skip this step

*Fig. 29*

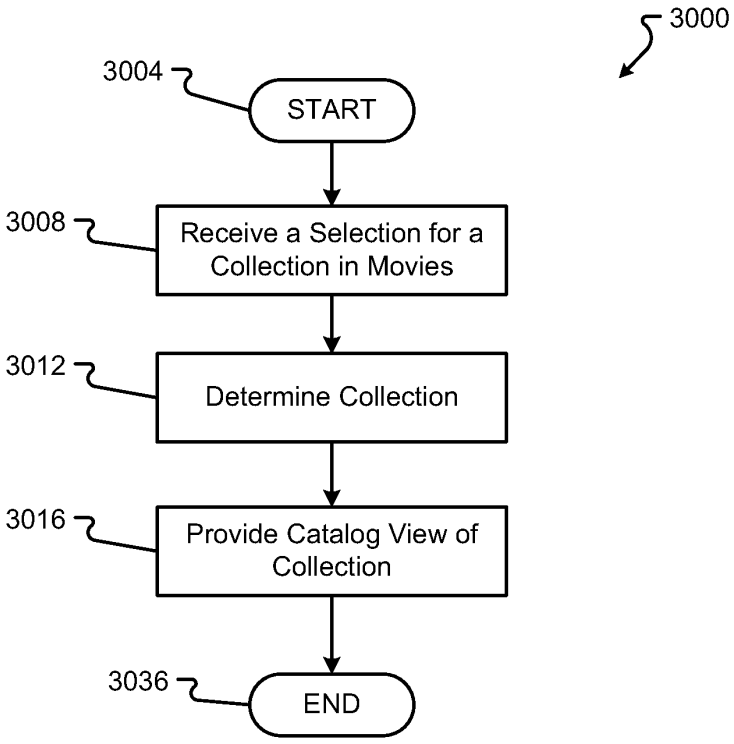

3000
3004
START
3008
Receive a Selection for a Collection in Movies
3012
Determine Collection
3016
Provide Catalog View of Collection
3036
END

***Fig. 30***


3100
3104
3108
3112
3116
Movies
United States
Thriller
2012
2
3

*Fig. 31*

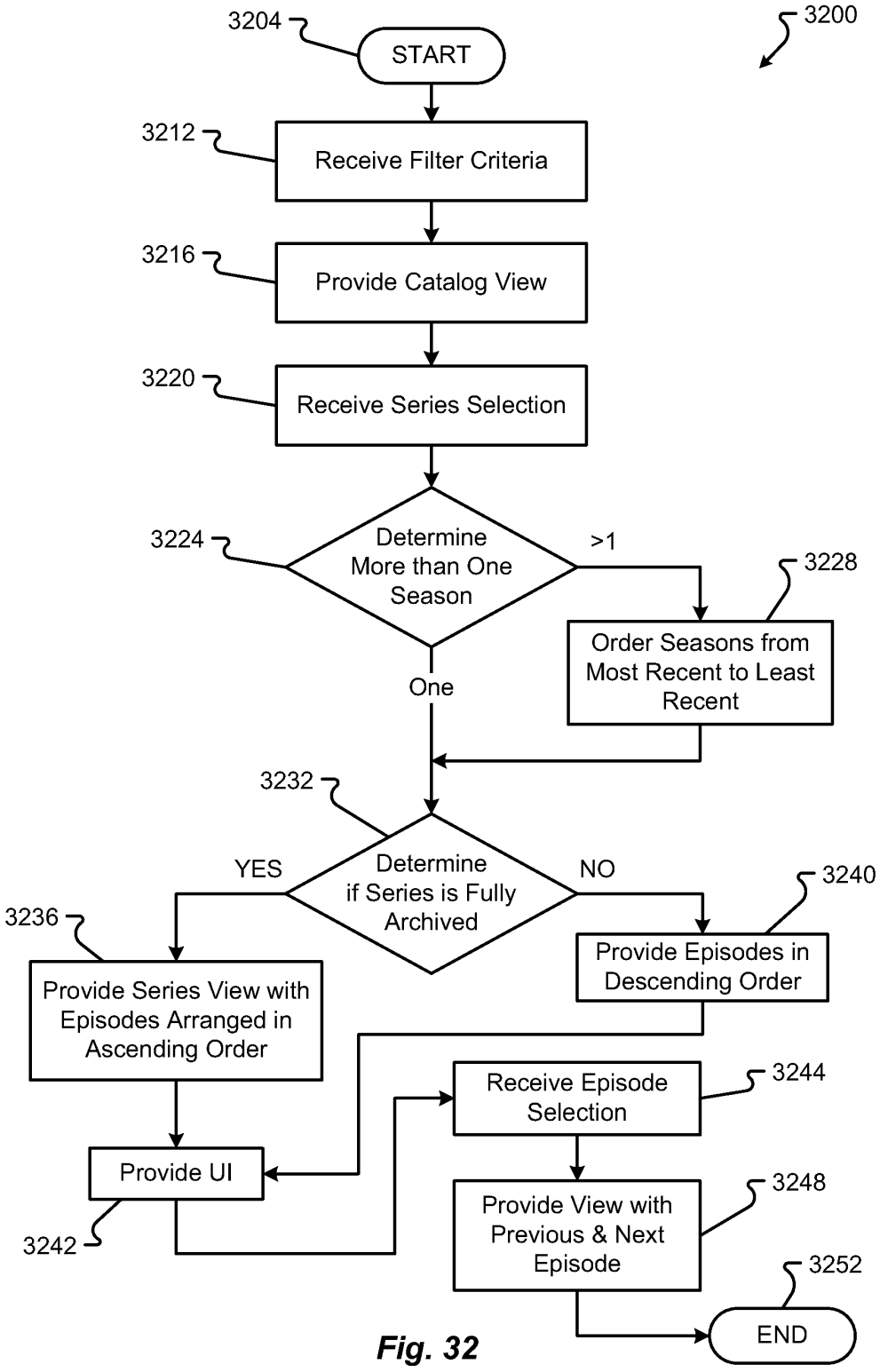

3200
3204
START
3212
Receive Filter Criteria
3216
Provide Catalog View
3220
Receive Series Selection
3224
Determine More than One Season
>1
3228
Order Seasons from Most Recent to Least Recent
One
3232
Determine if Series is Fully Archived
YES
NO
3236
Provide Series View with Episodes Arranged in Ascending Order
3240
Provide Episodes in Descending Order
3244
Receive Episode Selection
Provide UI
3242
3248
Provide View with Previous & Next Episode
3252
END

***Fig. 32***

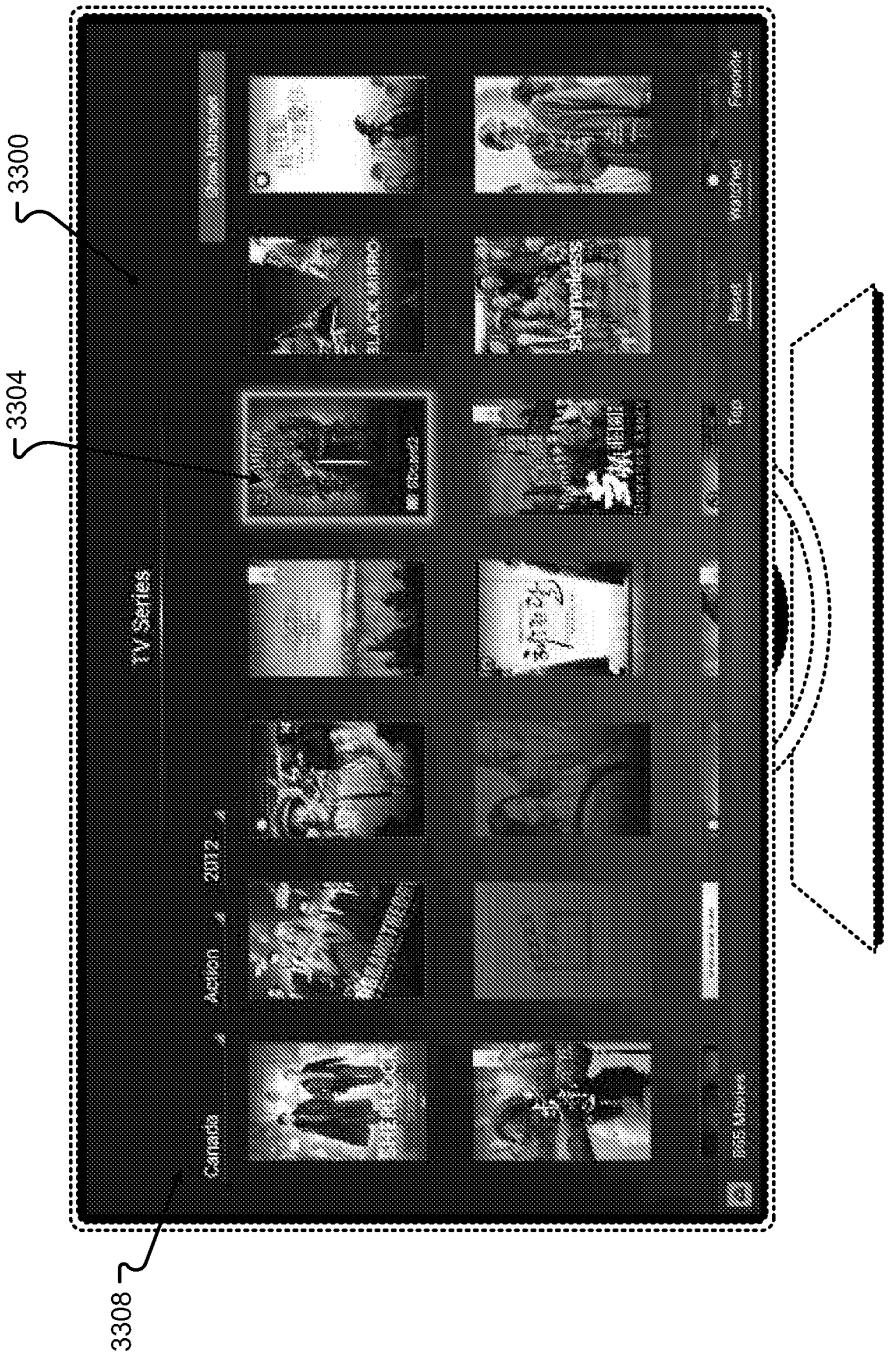



*Fig. 33*

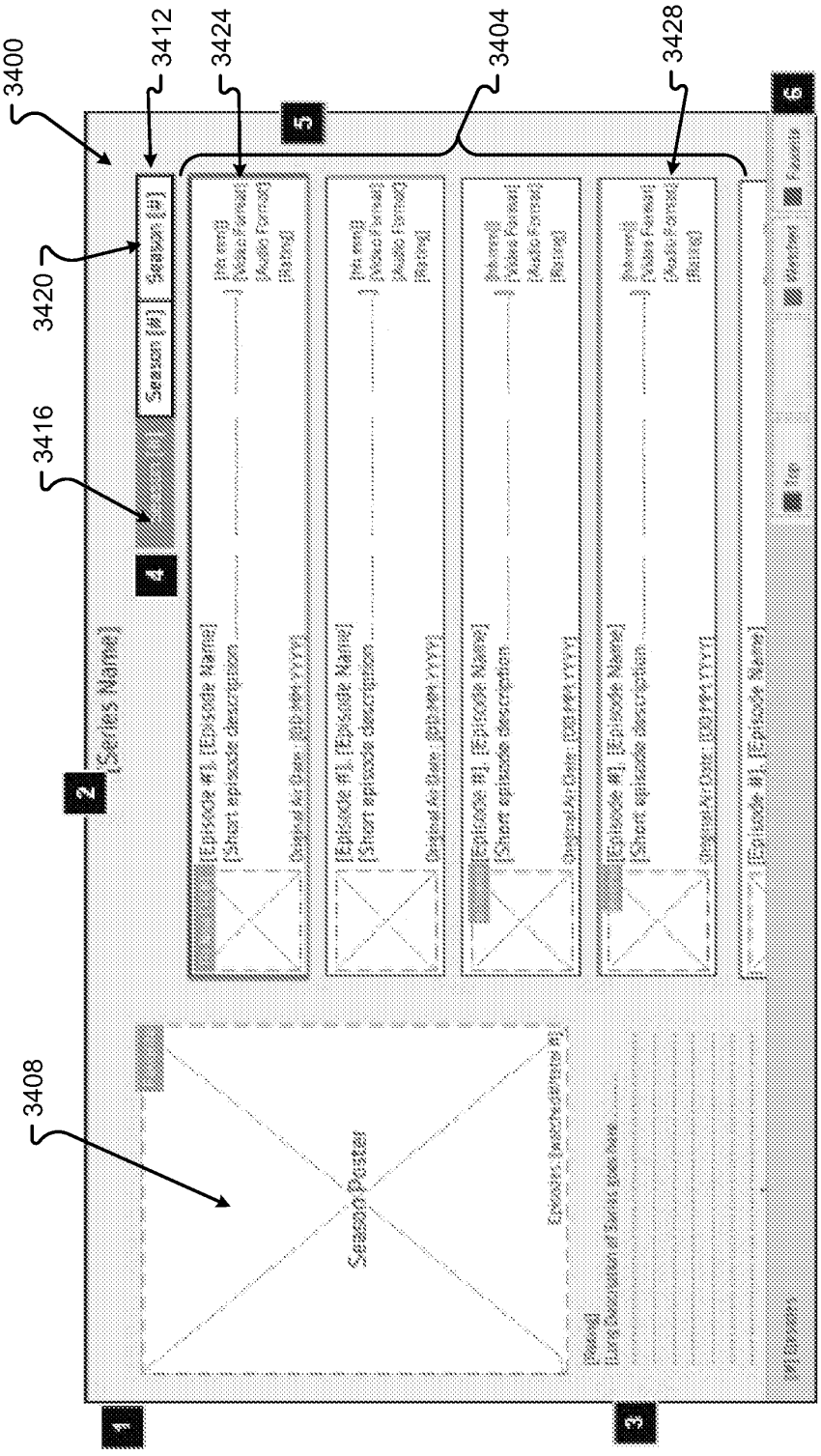

3400
3412
3424
3404
3428
3420
3416
3408
[Series Name]
Season [#]
Season [#]
[Episode #1 Episode Name]
[Short episode description]
[Episode #1 Episode Name]
[Short episode description]
[Episode #1 Episode Name]
[Short episode description]
[Episode #1 Episode Name]
[Short episode description]
Season Poster
1
2
3
4
5
6

*Fig. 34*

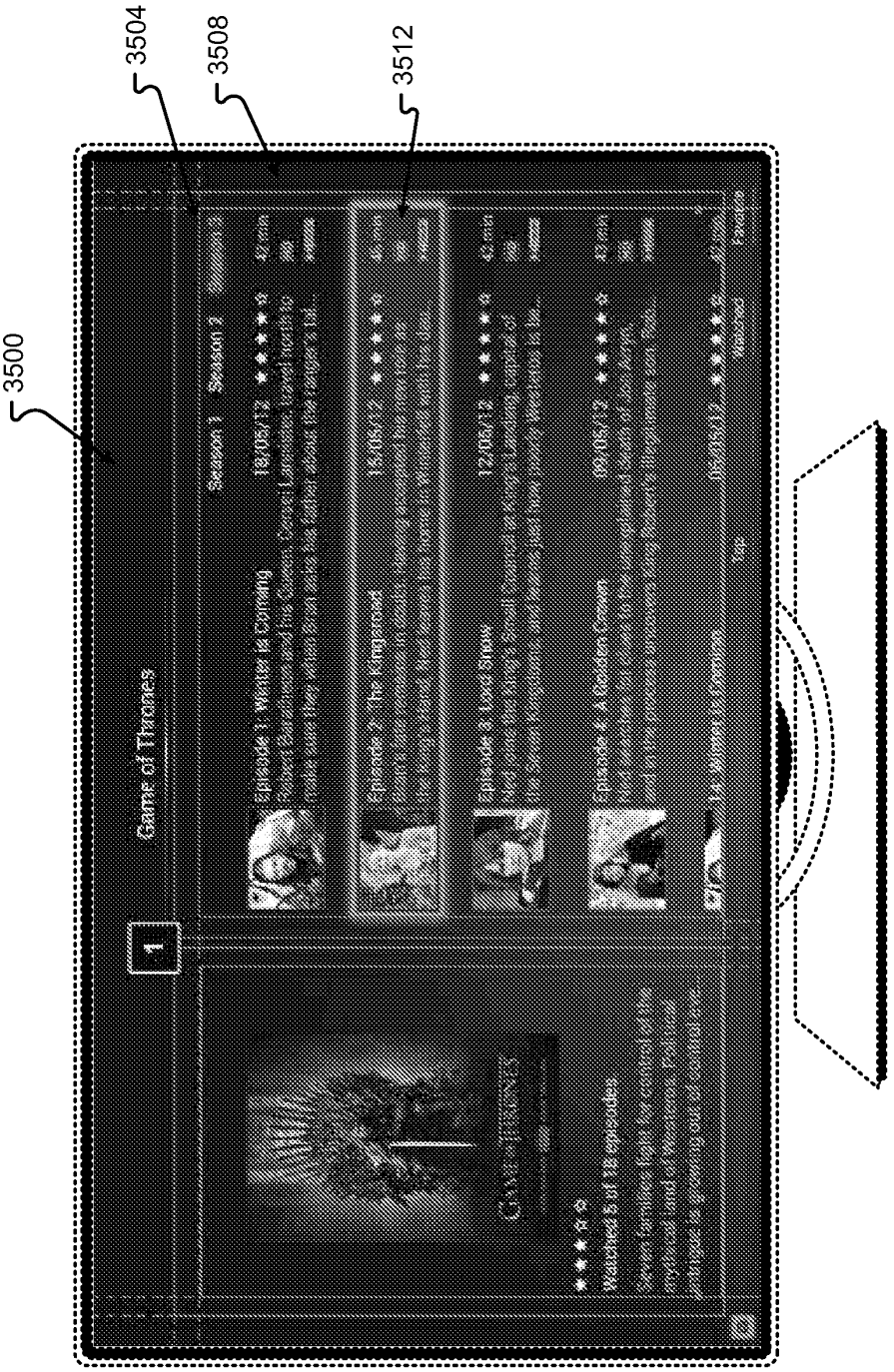



*Fig. 35*

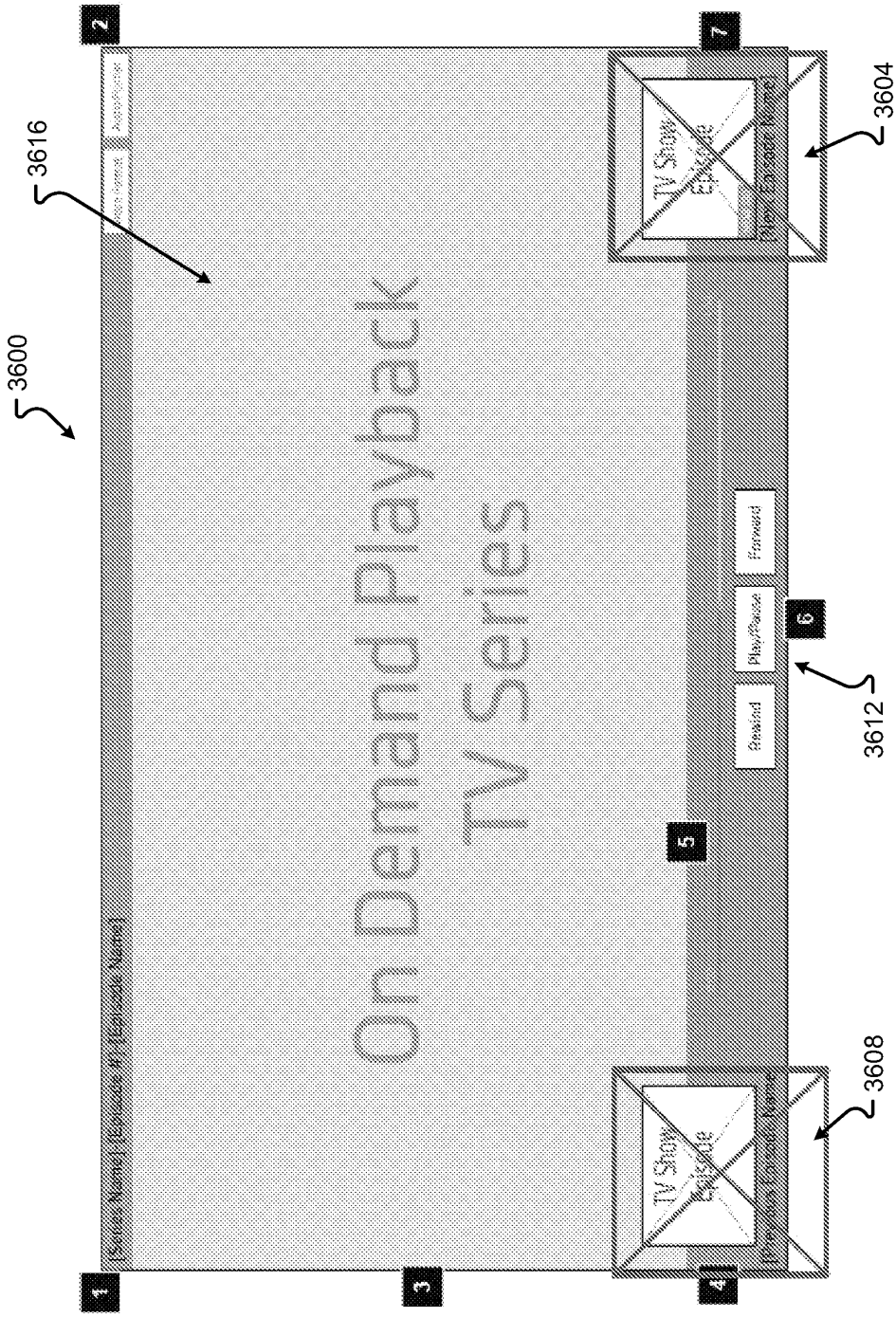

3600
3616
On Demand Playback
TV Series
3604
3608
3612
Rewind
Play/Pause
Forward

*Fig. 36*

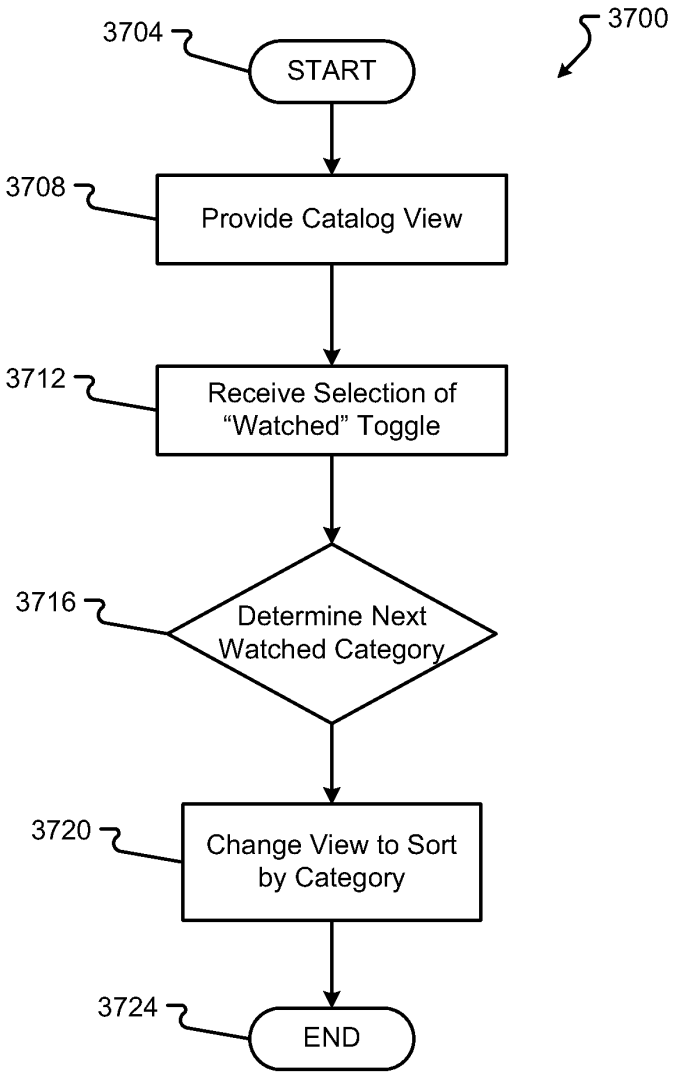

3700
3704
START
3708
Provide Catalog View
3712
Receive Selection of "Watched" Toggle
3716
Determine Next Watched Category
3720
Change View to Sort by Category
3724
END

***Fig. 37***

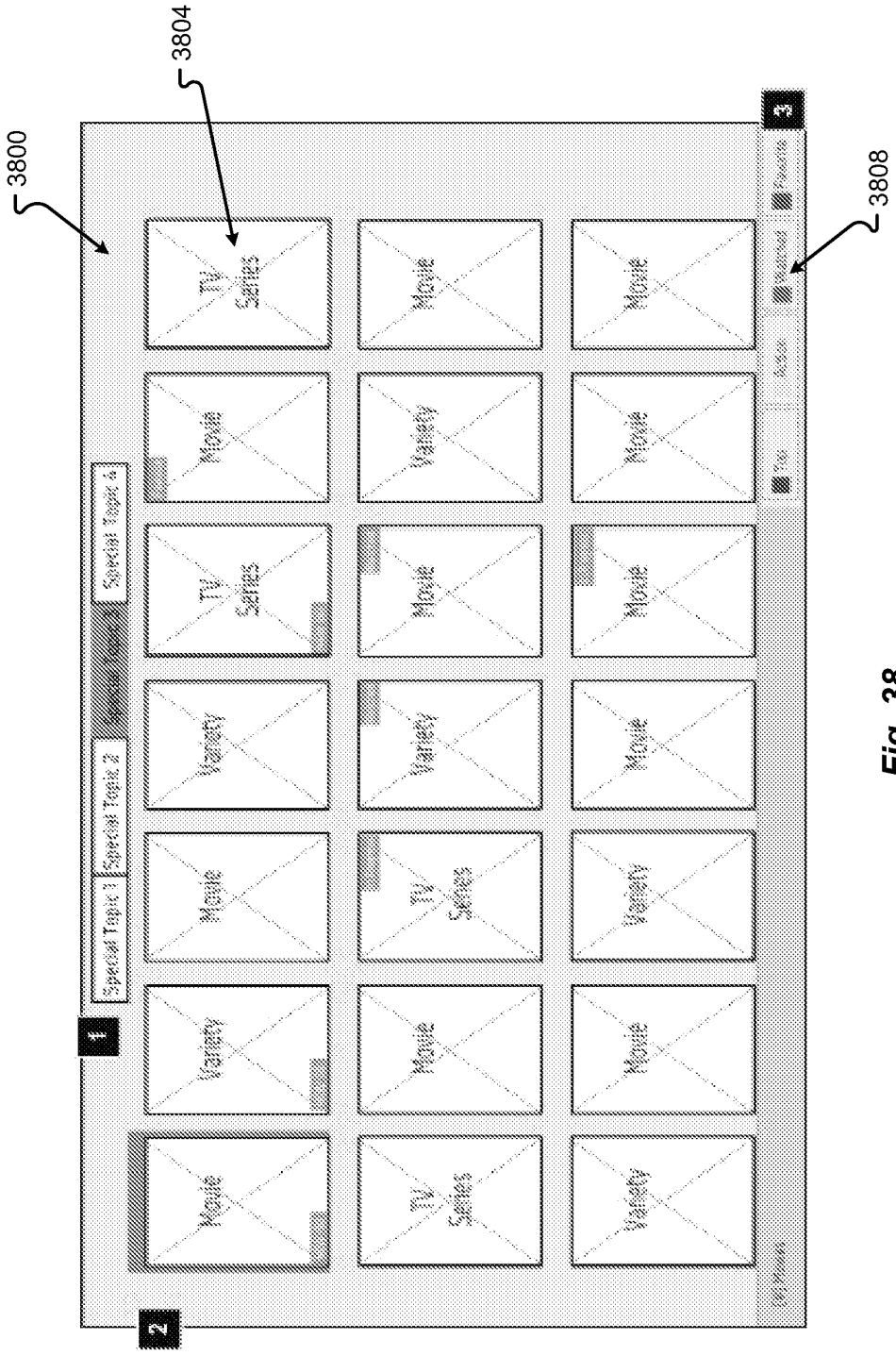

3800
3804
3808
1
2
3
Special Topic 1
Special Topic 2
Special Topic 4
TV Series
Movie
Variety

*Fig. 38*

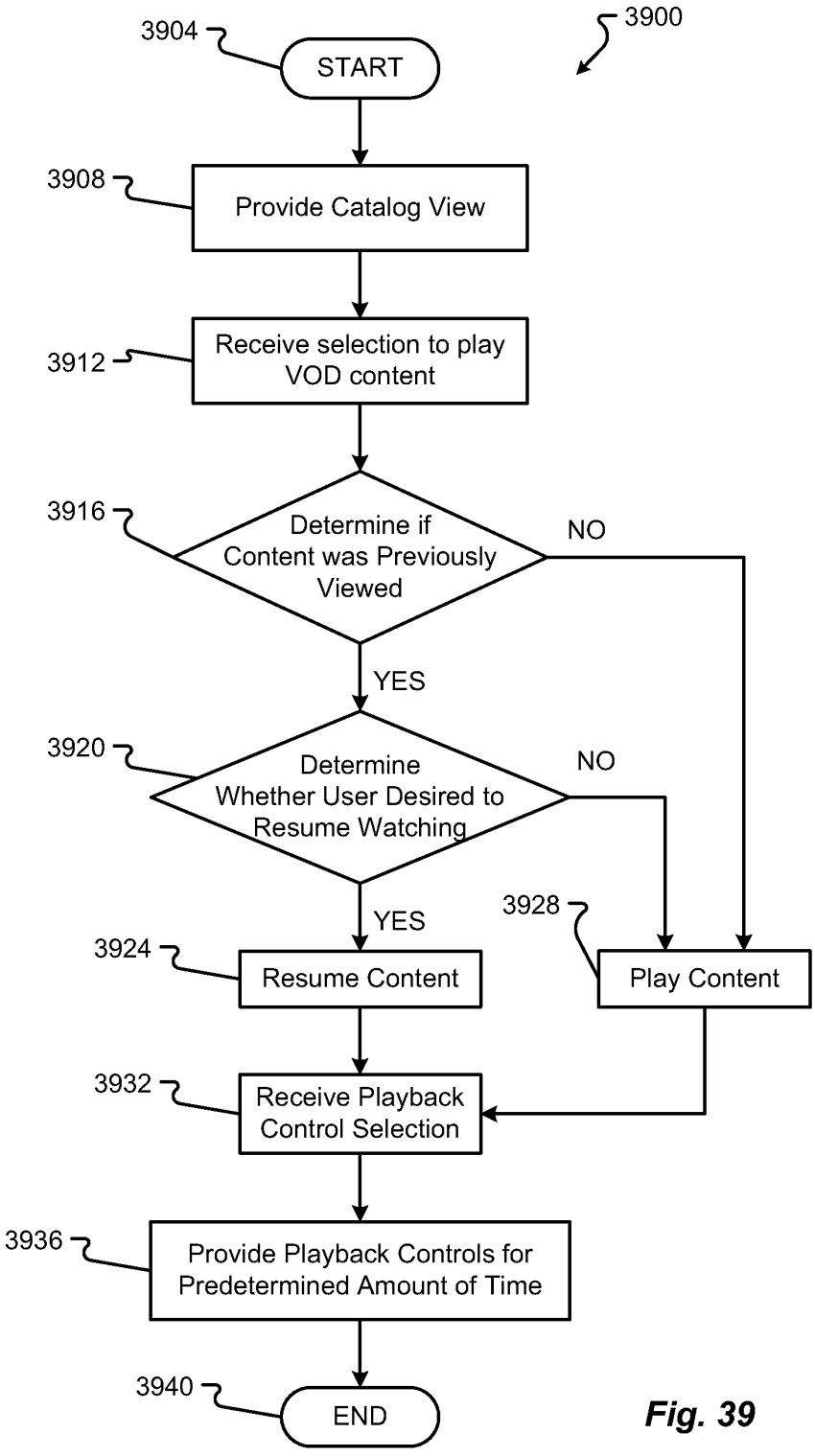

3900
3904
START
3908
Provide Catalog View
3912
Receive selection to play VOD content
3916
Determine if Content was Previously Viewed
NO
YES
3920
Determine Whether User Desired to Resume Watching
NO
YES
3928
3924
Resume Content
Play Content
3932
Receive Playback Control Selection
3936
Provide Playback Controls for Predetermined Amount of Time
3940
END

***Fig. 39***

PTO/AIA/01 (06-12)
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# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| **Title of Invention** | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |
|---|---|

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 13/970,427 filed on August 19, 2013.

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: Mohammed Selim Date (Optional) :_____

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.*

Atty. Docket No. 6583-440

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
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# DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76)

| | |
|---|---|
| **Title of Invention** | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |

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 13/970,427 filed on August 19, 2013.

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: Saulo Correia Dourado Date (Optional) :

Signature: Saulo Dourado

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.*

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

| | |
|---|---|
| In Re the Application of: | Group Art Unit: |
| SELIM et al. | Confirmation No.: |
| Serial No.: | Examiner: |
| Filed: September 8, 2015 | |
| Atty. File No.: 6583-440-CON | |
| Entitled: "SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION" | ***Submitted Via EFS-Web*** |

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

**PRELIMINARY AMENDMENT**

Dear Sir/Madam:

Prior to the initial review of the above-identified patent application by the Examiner, please enter the following Preliminary Amendment:

**Amendments to the Specification** begin on page **2** of this paper.

**Amendments to the Claims** are reflected in the listing of claims which begins on page **3** of this paper.

**Remarks/Arguments** begin on page **9** of this paper.

**AMENDMENTS TO THE SPECIFICATION**

Please amend paragraph [0001] of the specification as follows:

**[0001]** The present application is a continuation of and claims priority to U.S. Patent Application Serial No. 13/970,427; U.S. Patent Application Serial No. 13/970,388; U.S. Patent Application Serial No. 13/970,409; U.S. Patent Application Serial No. 13/970,420; U.S. Patent Application Serial No. 13/970,442; and U.S. Patent Application Serial No. 13/970,450, all filed on August 19, 2013, each of which claims the benefits of and priority, under 35 U.S.C. § 119(e), to U.S. Provisional Application Serial Nos. 61/684,672 filed August 17, 2012, "Smart TV"; 61/702,650 filed September 18, 2012, "Smart TV"; 61/697,710 filed September 6, 2012, "Social TV"; 61/700,182 filed September 12, 2012, "Social TV Roadmap"; 61/736,692 filed December 13, 2012, "SmartTV"; 61/798,821 filed March 15, 2013, "SmartTV"; 61/804,942 filed March 25, 2013, "SmartTV"; 61/804,998 filed March 25, 2013, "SmartTV"; 61/804,971 filed March 25, 2013, "SmartTV"; 61/804,990 filed March 25, 2013, "SmartTV"; 61/805,003 filed March 25, 2013, "SmartTV"; 61/805,053 filed March 25, 2013, "SmartTV"; 61/805,030 filed March 25, 2013, "SmartTV"; 61/805,027 filed March 25, 2013, "SmartTV"; 61/805,042 filed March 25, 2013, "SmartTV"; and 61/805,038 filed March 25, 2013, "SmartTV." Each of the aforementioned documents is incorporated herein by reference in their entirety for all that they teach and for all purposes.

**AMENDMENTS TO THE CLAIMS**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims**

1-16. (Canceled)

17. (New) A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a first selection for VOD content; in response to the first selection, providing a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

receiving a second selection for VOD content;

in response to the second selection, providing a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

receiving a third selection for VOD content; and

in response to the third selection, providing either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series.

18. (New) An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive a first selection for VOD content;

in response to the first selection, provide a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

receive a second selection for VOD content;

in response to the second selection, provide a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

receive a third selection for VOD content; and

in response to the third selection, provide either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series.

19. (New) The method as defined in claim 17, further comprising:

determining if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, providing the digest view; and

if the selection in the collection view is for one of a movie or single show, providing a detail view.

20. (New) The method as defined in claim 19, wherein the digest view provides a listing of two or more episodes associated with the series.

21. (New) The method as defined in claim 20, further comprising:

receiving a fourth selection of an episode in the digest view; and

in response to the fourth selection, providing a player to present the episode to the user.

22. (New) The method as defined in claim 21, further comprising:

receiving a fifth selection of a user interface device to play the movie or single show; and

in response to the fifth selection, providing a player to present the movie or single show to the user.

23. (New) The method as defined in claim 19, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a

top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

24. (New) The method as defined in claim 23, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria.

25. (New) The method as defined in claim 24, wherein the master view includes a navigation bar to select between types of content.

26. (New) The method as defined in claim 25, wherein the types of content include showcase content, movies content, television series content, or variety content.

27. (New) The method as defined in claim 26, wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

28. (New) The intelligent television system as defined in claim 18, wherein the user interface application is further operable to:

determine if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, provide the digest view, wherein the digest view provides a listing of two or more episodes associated with the series;

if the selection in the collection view is for one of a movie or single show, provide a detail view;

receive a fourth selection of an episode in the digest view; and

in response to the fourth selection, provide a player to present the episode to the user.

29. (New) The intelligent television system as defined in claim 28, wherein the user interface application is further operable to:

receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user.

30. (New) The intelligent television system as defined in claim 29, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

31. (New) The intelligent television system as defined in claim 30, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

32. (New) A non-transitory computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising:

instructions to receive a first selection for VOD content;

in response to the first selection, instructions to provide a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

instructions to receive a second selection for VOD content;

in response to the second selection, instructions to provide a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

instructions to receive a third selection for VOD content; and

in response to the third selection, instructions to provide either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of

VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series.

33. (New) The computer readable medium as defined in claim 32, further comprising instructions to:

determine if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, provide the digest view, wherein the

digest view provides a listing of two or more episodes associated with the series;

if the selection in the collection view is for one of a movie or single show, provide a detail view;

receive a fourth selection of an episode in the digest view; and

in response to the fourth selection, provide a player to present the episode to the user.

34. (New) The computer readable medium as defined in claim 33, further comprising instructions to:

receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user.

35. (New) The computer readable medium as defined in claim 34, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

36. (New) The computer readable medium as defined in claim 35, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout includes

user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

## REMARKS/ARGUMENTS

By this amendment, claims 1-16 are canceled without prejudice or disclaimer and new claims 17-36 have been added. Therefore, claims 17-36 are present for examination. The amendments to the specification only update the cross-reference paragraph to the specification, therefore no substitute specification is required (1300 OG 69).

Applicant believes that the pending claims are in condition for allowance and such disposition is respectfully requested. In the event that a telephone conversation would further prosecution and/or expedite allowance, the Examiner is invited to contact the undersigned.

No fees for extensions of time are believed to be due. However, if this is in error, please debit any underpayment for any extension of time to Deposit Account No. 19-1970.

Respectfully submitted,

SHERIDAN ROSS P.C.

By: /Tadd F. Wilson/
Tadd F. Wilson
Registration No. 54,544
1560 Broadway, Suite 1200
Denver, Colorado 80202-5141
(303) 863-9700

Date: September 8, 2015

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>14/847,537 | Filing Date<br>09/08/2015 | ☐ To be Mailed |
|---|---|---|---|

**ENTITY**: ☒ LARGE ☐ SMALL ☐ MICRO

## APPLICATION AS FILED – PART I

| | (Column 1) | (Column 2) | | |
|---|---|---|---|---|
| FOR | NUMBER FILED | 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

| | | (Column 1) | | (Column 2) | (Column 3) | | |
|---|---|---|---|---|---|---|---|
| | 09/08/2015 | CLAIMS REMAINING AFTER AMENDMENT | | HIGHEST NUMBER PREVIOUSLY PAID FOR | PRESENT EXTRA | RATE ($) | ADDITIONAL FEE ($) |
| AMENDMENT | 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 |

| | | (Column 1) | | (Column 2) | (Column 3) | | |
|---|---|---|---|---|---|---|---|
| | | CLAIMS REMAINING AFTER AMENDMENT | | HIGHEST NUMBER PREVIOUSLY PAID FOR | PRESENT EXTRA | RATE ($) | ADDITIONAL FEE ($) |
| AMENDMENT | 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
/ROLITA WIMBUSH/

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.*

## PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number: 14/847,537

### 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($) | ADDITIONAL FEE($) | OR | RATE($) | ADDITIONAL FEE($) |
|---|---|---|---|---|---|---|---|---|---|---|
| AMENDMENT B | Total (37 CFR 1.16(i)) | * | Minus | ** | = | x = | | OR | x = | |
| | Independent (37 CFR 1.16(h)) | * | Minus | *** | = | x = | | OR | x = | |
| | Application Size Fee (37 CFR 1.16(s)) | | | | | | | | | |
| | FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j)) | | | | | | | OR | | |
| | | | | | | TOTAL ADD'L FEE | | OR | TOTAL ADD'L FEE | |

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.

** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".

*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".

The "Highest Number Previously Paid For" (Total or Independent) is the highest found in the appropriate box in column 1.

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| APPLICATION NUMBER | FILING or 371(c) DATE | GRP ART UNIT | FIL FEE REC'D | ATTY.DOCKET.NO | TOT CLAIMS | IND CLAIMS |
|---|---|---|---|---|---|---|
| 14/847,537 | 09/08/2015 | 2425 | 0.00 | 6583-440-CON | 20 | 3 |

**CONFIRMATION NO. 3161**

**FILING RECEIPT**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

OC000000077583852

Date Mailed: 09/23/2015

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)**

Mohammed Selim, Oakville, CANADA;
Saulo Correia Dourado, Oakville, CANADA;
Sanjiv Sirpal, Oakville, CANADA;

**Applicant(s)**

Flextronics AP, LLC, San Jose, CA;

**Power of Attorney:** The patent practitioners associated with Customer Number 111285

**Domestic Priority data as claimed by applicant**

This application is a CON of 13/970,427 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

This application 14/847,537
is a CON of 13/970,388 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,409 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and said 13/970,409
claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,420 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013

and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,442 08/19/2013
which claims benefit of 61/684,672 08/17/2012 *
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,450 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
(*)Data provided by applicant is not consistent with PTO records.
and said 13/970,450
claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

**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.*

**If Required, Foreign Filing License Granted:** 09/21/2015

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 14/847,537**

**Projected Publication Date:** To Be Determined - pending completion of Missing Parts

**Non-Publication Request:** No

**Early Publication Request:** No

**Title**

SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION

**Preliminary Class**

725

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

## 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).

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### *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.

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 |
|---|---|---|---|
| 14/847,537 | 09/08/2015 | Mohammed Selim | 6583-440-CON |

**CONFIRMATION NO. 3161**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

**FORMALITIES LETTER**

*OC000000077583653*

Date Mailed: 09/23/2015

# NOTICE TO FILE MISSING PARTS OF NONPROVISIONAL APPLICATION

**FILED UNDER 37 CFR 1.53(b)**

***Filing Date Granted***

**Items Required To Avoid Abandonment:**

An application number and filing date have been accorded to this application. The item(s) indicated below, however, are missing. Applicant is given **TWO MONTHS** from the date of this Notice within which to file all required items below to avoid abandonment. Extensions of time may be obtained by filing a petition accompanied by the extension fee under the provisions of 37 CFR 1.136(a).

- The statutory basic filing fee is missing.
- The application search fee must be submitted.
- The application examination fee must be submitted.
- Surcharge as set forth in 37 CFR 1.16(f) must be submitted.
  The surcharge is due for any one of:
  - late submission of the basic filing fee, search fee, or examination fee,
  - late submission of inventor's oath or declaration,
  - filing an application that does not contain at least one claim on filing, or
  - submission of an application filed by reference to a previously filed application.

**SUMMARY OF FEES DUE:**

The fee(s) required within **TWO MONTHS** from the date of this Notice to avoid abandonment is/are itemized below. No entity status discount is in effect. If applicant is qualified for small entity status, a written assertion of small entity status must be submitted to establish small entity status. (See 37 CFR 1.27). If applicant is qualified for micro entity status, an acceptable Certification of Micro Entity Status must be submitted to establish micro entity status. (See 37 CFR 1.29 and forms PTO/SB/15A and 15B.)

- $ **280** basic filing fee.
- $ **140** surcharge.
- $ **600** search fee.
- $ **720** examination fee.
- $( **0**) previous unapplied payment amount.
- $ **1740** TOTAL FEE BALANCE DUE.

**Items Required To Avoid Processing Delays:**

Applicant is notified that the above-identified application contains the deficiencies noted below. No period for reply is set forth in this notice for correction of these deficiencies. However, if a deficiency relates to the inventor's oath or declaration, the applicant must file an oath or declaration in compliance with 37 CFR 1.63, or a substitute statement in compliance with 37 CFR 1.64, executed by or with respect to each actual inventor no later than the expiration of the time period set in the "Notice of Allowability" to avoid abandonment. See 37 CFR 1.53(f).

- A properly executed inventor's oath or declaration has not been received for the following inventor(s):
  Sanjiv Sirpal

Replies must be received in the USPTO within the set time period or must include a proper Certificate of Mailing or Transmission under 37 CFR 1.8 with a mailing or transmission date within the set time period. For more information and a suggested format, see Form PTO/SB/92 and MPEP 512.

Replies should be mailed to:

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

Registered users of EFS-Web may alternatively submit their reply to this notice via EFS-Web, including a copy of this Notice and selecting the document description "Applicant response to Pre-Exam Formalities Notice". https://sportal.uspto.gov/authenticate/AuthenticateUserLocalEPF.html

For more information about EFS-Web please call the USPTO Electronic Business Center at 1-866-217-9197 or visit our website at http://www.uspto.gov/ebc.

If you are not using EFS-Web to submit your reply, you must include a copy of this notice.

Questions about the contents of this notice and the requirements it sets forth should be directed to the Office of Data Management, Application Assistance Unit, at **(571) 272-4000** or **(571) 272-4200** or **1-888-786-0101**.

/mmasfaw/

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

| | |
|---|---|
| In Re the Application of: | Group Art Unit: 2425 |
| SELIM et al. | Confirmation No.: 3161 |
| Serial No.: 14/847,537 | Examiner: Not yet assigned |
| Filed: September 8, 2015 | |
| Atty. File No.: 6583-440-CON | |
| Entitled: "SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION" | ***Submitted Via EFS-Web*** |

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

**RESPONSE TO NOTICE TO FILE MISSING PARTS**

Dear Sir/Madam:

In response to the Notice to File Missing Parts of Nonprovisional Application mailed September 23, 2015, in connection with the above-identified application, submitted via EFS-web are the following fees:

| | |
|---|---|
| Statutory basic filing fee | $280.00 |
| Search fee | 600.00 |
| Examination fee | 720.00 |
| Late fee surcharge | 140.00 |
| **Total Fees** | **$1,740.00** |

Also submitted herewith is a corrected Application Data Sheet correcting the filing date for Serial No. 61/684,672 in the Domestic Priority Information Section. Although no other fees are believed due with this submission, please credit any overpayment or debit any underpayment to Deposit Account No. 19-1970.

Respectfully submitted,

SHERIDAN ROSS P.C.

By: /Tadd F. Wilson/
Tadd F. Wilson
Registration No. 54544
1560 Broadway, Suite 1200
Denver, Colorado 80202-5141
(303) 863-9700

Date: November 20, 2015

# Electronic Patent Application Fee Transmittal

| | |
|---|---|
| **Application Number:** | 14847537 |
| **Filing Date:** | 08-Sep-2015 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Filer:** | Tadd Fjelp Wilson/Amy Duarte |
| **Attorney Docket Number:** | 6583-440-CON |

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:** | | | | |
| Late Filing Fee for Oath or Declaration | 1051 | 1 | 140 | 140 |
| **Petition:** | | | | |

| Description | Fee Code | Quantity | Amount | Sub-Total in USD($) |
|---|---|---|---|---|
| **Patent-Appeals-and-Interference:** | | | | |
| **Post-Allowance-and-Post-Issuance:** | | | | |
| **Extension-of-Time:** | | | | |
| **Miscellaneous:** | | | | |
| | | **Total in USD ($)** | | **1740** |

| Electronic Acknowledgement Receipt | |
|---|---|
| **EFS ID:** | 24147026 |
| **Application Number:** | 14847537 |
| **International Application Number:** | |
| **Confirmation Number:** | 3161 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Customer Number:** | 111285 |
| **Filer:** | Tadd Fjelp Wilson/Amy Duarte |
| **Filer Authorized By:** | Tadd Fjelp Wilson |
| **Attorney Docket Number:** | 6583-440-CON |
| **Receipt Date:** | 20-NOV-2015 |
| **Filing Date:** | 08-SEP-2015 |
| **Time Stamp:** | 14:24:44 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | yes |
| Payment Type | Deposit Account |
| Payment was successfully received in RAM | $1740 |
| RAM confirmation Number | 670 |
| Deposit Account | 191970 |
| Authorized User | WILSON, TADD |
| 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 | Application Data Sheet | 6583-440-CON_ADS-Corrected.pdf | 1508917<br>1214a9c46faea4e601635ffdc100ad3fd14f174b | no | 16 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| This is not an USPTO supplied ADS fillable form | | | | | |
| 2 | Applicant Response to Pre-Exam Formalities Notice | 6583-440-CON_Response_Missing_Parts.pdf | 118444<br>82f2835f54c0c0bc390d5e2579720ee3c7b3a009 | no | 1 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 3 | Fee Worksheet (SB06) | fee-info.pdf | 37170<br>53140bb01746b5e9cabfb044e8c49099d335038e | no | 2 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| | | **Total Files Size (in bytes):** | 1664531 | | |

**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 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | 14/847,537 |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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 |
|---|---|---|---|---|
| | Mohammed | | Selim | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2488 Oakhaven Drive | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6M4B9 | Country [i] | CA |

**Inventor 2** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Saulo | Correia | Dourado | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2420 Ravinebrook Cres. | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6H 6Y2 | Country [i] | CA |

**Inventor 3** Remove

**Legal Name**

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Sanjiv | | Sirpal | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 3264 Stocksbridge Avenue | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6M 0E3 | Country [i] | CA |

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 | 111285 | | |
|---|---|---|---|
| Email Address | flexpatents@sheridanross.com | Add Email | Remove Email |

## Application Information:

| Title of the Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | | |
|---|---|---|---|
| Attorney Docket Number | 6583-440-CON | Small Entity Status Claimed | ☐ |
| Application Type | Nonprovisional | | |
| Subject Matter | Utility | | |
| Total Number of Drawing Sheets (if any) | 47 | Suggested Figure for Publication (if any) | |

## 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 |
|---|---|---|
| | | |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

## 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:

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 | 111285 | | |

## Domestic Benefit/National Stage Information:

This section allows for the applicant to either claim benefit under 35 U.S.C. 119(e), 120, 121, 365(c), or 386(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 | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970427 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/700182 | 2012-09-12 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805038 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970388 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805003 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970409 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/798821 | 2013-03-15 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970420 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/684672 | 2012-08-17 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805030 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970442 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/684672 | ~~2012-08-19~~ **2012-08-17** |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804998 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970450 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/697710 | 2012-09-06 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805042 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| Prior Application Status | Expired | Remove | |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805038 | 2013-03-25 |

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. When priority is claimed to a foreign application that is eligible for retrieval under the priority document exchange program (PDX)[i] the information will be used by the Office to automatically attempt retrieval pursuant to 37 CFR 1.55(i)(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[i] | Filing Date (YYYY-MM-DD) | Access Code[i] (if applicable) |
|---|---|---|---|
| | | | |

Additional Foreign Priority Data may be generated within this form by selecting the **Add** button.

## 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

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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.

**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 | Flextronics AP, LLC |
|---|---|

**Mailing Address Information For Applicant:**

| | | | |
|---|---|---|---|
| **Address 1** | 6201 America Center Drive | | |
| Address 2 | | | |
| **City** | San Jose | **State/Province** | CA |
| **Country** | US | Postal Code | 95002 |
| Phone Number | | Fax Number | |

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

| 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. ☐

| 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** i | | 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** | /Tadd F. Wilson/ | | | Date (YYYY-MM-DD) | 2015-11-20 |
|---|---|---|---|---|---|
| First Name | Tadd F. | Last Name | Wilson | Registration Number | 54544 |

Additional Signature may be generated within this form by selecting the Add button.

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION | |

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.**

# 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 C o o p eration 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.

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** | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |
|---|---|

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 13/970,450 filed on August 19, 2013.

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: Mohammed Selim Date (Optional) :_____

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.*

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 24147206 |
| **Application Number:** | 14847537 |
| **International Application Number:** | |
| **Confirmation Number:** | 3161 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Customer Number:** | 111285 |
| **Filer:** | Tadd Fjelp Wilson/Amy Duarte |
| **Filer Authorized By:** | Tadd Fjelp Wilson |
| **Attorney Docket Number:** | 6583-440-CON |
| **Receipt Date:** | 20-NOV-2015 |
| **Filing Date:** | 08-SEP-2015 |
| **Time Stamp:** | 14:31:39 |
| **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 | Oath or Declaration filed | 6583-442_Executed_Declaration-Sirpal.pdf | 140952<br>579a0597065f0cc92e0b8bd6af33f4ac00274f4c | no | 1 |

| | |
|---|---|
| **Warnings:** | |
| **Information:** | |

| | |
|---|---|
| **Total Files Size (in bytes):** | 140952 |

**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 NUMBER | FILING OR 371(C) DATE | FIRST NAMED APPLICANT | ATTY. DOCKET NO./TITLE |
|---|---|---|---|
| 14/847,537 | 09/08/2015 | Mohammed Selim | 6583-440-CON |

**CONFIRMATION NO. 3161**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

**INFORMAL NOTICE**

*OC000000078876422*

Date Mailed: 11/25/2015

## INFORMATIONAL NOTICE TO APPLICANT

Applicant is notified that the above-identified application contains the deficiencies noted below. No period for reply is set forth in this notice for correction of these deficiencies. However, if a deficiency relates to the inventor's oath or declaration, the applicant must file an oath or declaration in compliance with 37 CFR 1.63, or a substitute statement in compliance with 37 CFR 1.64, executed by or with respect to each actual inventor no later than the expiration of the time period set in the "Notice of Allowability" to avoid abandonment. See 37 CFR 1.53(f).

The item(s) indicated below are also required and should be submitted with any reply to this notice to avoid further processing delays.

- A properly executed inventor's oath or declaration has not been received for the following inventor(s):
  Sanjiv Sirpal

Questions about the contents of this notice and the requirements it sets forth should be directed to the Office of Data Management, Application Assistance Unit, at **(571) 272-4000** or **(571) 272-4200** or **1-888-786-0101**.

/dgela/

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 |
|---|---|---|---|---|---|---|
| 14/847,537 | 09/08/2015 | 2425 | 1740 | 6583-440-CON | 20 | 3 |

**CONFIRMATION NO. 3161**

**UPDATED FILING RECEIPT**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

OC000000078876421

Date Mailed: 11/25/2015

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)**

Mohammed Selim, Oakville, CANADA;
Saulo Correia Dourado, Oakville, CANADA;
Sanjiv Sirpal, Oakville, CANADA;

**Applicant(s)**

Flextronics AP, LLC, San Jose, CA;

**Power of Attorney:** The patent practitioners associated with Customer Number 111285

**Domestic Priority data as claimed by applicant**

This application is a CON of 13/970,427 08/19/2013 ABN
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

This application 14/847,537
is a CON of 13/970,388 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,409 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and said 13/970,409
claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,420 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013

and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,442 08/19/2013 PAT 9185325
which claims benefit of 61/684,672 08/17/2012 *
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,450 08/19/2013 PAT 9167187
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
(*)Data provided by applicant is not consistent with PTO records.
and said 13/970,450
claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

**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:** No

**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:** 09/21/2015
The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 14/847,537**
**Projected Publication Date:** 03/03/2016
**Non-Publication Request:** No
**Early Publication Request:** No
**Title**

SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION

**Preliminary Class**

725

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

## 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).

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## *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.

## PATENT APPLICATION FEE DETERMINATION RECORD

Substitute for Form PTO-875

Application or Docket Number: 14/847,537

### 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($) | ADDITIONAL FEE($) | OR | RATE($) | ADDITIONAL FEE($) |
|---|---|---|---|---|---|---|---|---|---|---|
| AMENDMENT B | Total (37 CFR 1.16(i)) | * | Minus | ** | = | x = | | OR | x = | |
| | Independent (37 CFR 1.16(h)) | * | Minus | *** | = | x = | | OR | x = | |
| | Application Size Fee (37 CFR 1.16(s)) | | | | | | | | | |
| | FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j)) | | | | | | | OR | | |
| | | | | | | TOTAL ADD'L FEE | | OR | TOTAL ADD'L FEE | |

* If the entry in column 1 is less than the entry in column 2, write "0" in column 3.

** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20".

*** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3".

The "Highest Number Previously Paid For" (Total or Independent) is the highest found in the appropriate box in column 1.

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

| | |
|---|---|
| In Re the Application of: | Group Art Unit: 2426 |
| SELIM et al. | Confirmation No.: 3161 |
| Serial No.: 14/847,537 | Examiner: |
| Filed: September 8, 2015 | |
| Atty. File No.: 6583-440-CON | |
| Entitled: "SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION" (as amended) | ***Submitted Via EFS-Web*** |

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

**REQUEST FOR CORRECTED FILING RECEIPT AND RESPONSE TO INFORMATIONAL NOTICE TO APPLICANT**

Dear Sir/Madam:

Please issue a corrected Filing Receipt in connection with the above-referenced patent application. The correct title for this application is "SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION." A marked-up Application Data Sheet is submitted herewith.

Further, in response to the Informational Notice to Applicant mailed November 25, 2014, in connection with the above-identified application, submitted herewith is an executed Declaration by inventor Sanjiv Sirpal. Although no fees are believed to be due with this submission, please charge any underpayment or credit any overpayment to Deposit Account No. 19-1970.

Respectfully submitted,

SHERIDAN ROSS P.C.

By: /Tadd F. Wilson/
Tadd F. Wilson
Registration No. 54544
1560 Broadway, Suite 1200
Denver, Colorado 80202-5141
(303) 863-9700

Date: December 2, 2015

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 | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |
|---|---|

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 13/970,388 filed on August 19, 2013.

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: Sanjiv Sirpal Date (Optional) :

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/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | 14/847,537 |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

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 |
|---|---|---|---|---|
| | Mohammed | | Selim | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2488 Oakhaven Drive | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6M4B9 | Country [i] | CA |

**Inventor 2** Remove

**Legal Name**

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Saulo | Correia | Dourado | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 2420 Ravinebrook Cres. | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6H 6Y2 | Country [i] | CA |

**Inventor 3** Remove

**Legal Name**

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. OMB 0651-0032
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prefix | Given Name | Middle Name | Family Name | Suffix |
|---|---|---|---|---|
| | Sanjiv | | Sirpal | |

**Residence Information (Select One)** ○ US Residency ◉ Non US Residency ○ Active US Military Service

| City | Oakville | Country of Residence [i] | CA |
|---|---|---|---|

**Mailing Address of Inventor:**

| Address 1 | 3264 Stocksbridge Avenue | | |
|---|---|---|---|
| Address 2 | | | |
| City | Oakville | State/Province | ON |
| Postal Code | L6M 0E3 | Country [i] | CA |

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 | 111285 | | |
|---|---|---|---|
| Email Address | flexpatents@sheridanross.com | Add Email | Remove Email |

## Application Information:

| Title of the Invention | **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | | |
|---|---|---|---|
| Attorney Docket Number | 6583-440-CON | Small Entity Status Claimed | ☐ |
| Application Type | Nonprovisional | | |
| Subject Matter | Utility | | |
| Total Number of Drawing Sheets (if any) | 47 | Suggested Figure for Publication (if any) | |

## 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 |
|---|---|---|
| | | |

PTO/AIA/14 (07-14)
Approved for use through 04/30/2017. 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 | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

## 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:

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 | 111285 | | |

## Domestic Benefit/National Stage Information:

This section allows for the applicant to either claim benefit under 35 U.S.C. 119(e), 120, 121, 365(c), or 386(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 | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970427 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/700182 | 2012-09-12 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970427 | Claims benefit of provisional | 61/805038 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Pending | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970388 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805003 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970388 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970409 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/798821 | 2013-03-15 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970409 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970420 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/684672 | 2012-08-17 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805030 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970420 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970442 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/697710 | 2012-09-06 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804998 | 2013-03-25 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805042 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970442 | Claims benefit of provisional | 61/805038 | 2013-03-25 |
| Prior Application Status | Pending | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| | Continuation of | 13/970450 | 2013-08-19 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/684672 | 2012-08-17 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/702650 | 2012-09-18 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/697710 | 2012-09-06 |

| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/700182 | 2012-09-12 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/736692 | 2012-12-13 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/798821 | 2013-03-15 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804942 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804998 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804971 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/804990 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805003 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805053 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805030 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805027 | 2013-03-25 |
| Prior Application Status | Expired | | Remove |
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805042 | 2013-03-25 |

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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| Prior Application Status | Expired | | Remove |
|---|---|---|---|
| Application Number | Continuity Type | Prior Application Number | Filing Date (YYYY-MM-DD) |
| 13/970450 | Claims benefit of provisional | 61/805038 | 2013-03-25 |

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. When priority is claimed to a foreign application that is eligible for retrieval under the priority document exchange program (PDX)[i] the information will be used by the Office to automatically attempt retrieval pursuant to 37 CFR 1.55(i)(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[i] | Filing Date (YYYY-MM-DD) | Access Code[i] (if applicable) |
| | | | |

Additional Foreign Priority Data may be generated within this form by selecting the **Add** button.

## 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

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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

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.

**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 | Flextronics AP, LLC |
|---|---|

**Mailing Address Information For Applicant:**

| | | | |
|---|---|---|---|
| **Address 1** | 6201 America Center Drive | | |
| Address 2 | | | |
| **City** | San Jose | **State/Province** | CA |
| **Country** | US | Postal Code | 95002 |
| Phone Number | | Fax Number | |

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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

| 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. ☐

| 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** i | | 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** | /Tadd F. Wilson/ | | | Date (YYYY-MM-DD) | 2015-12-02 |
|---|---|---|---|---|---|
| First Name | Tadd F. | Last Name | Wilson | Registration Number | 54544 |

Additional Signature may be generated within this form by selecting the Add button.

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| Application Data Sheet 37 CFR 1.76 | Attorney Docket Number | 6583-440-CON |
|---|---|---|
| | Application Number | |
| Title of Invention | ~~SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION~~ **SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION** | |

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.**

# 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 C o o p eration 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:** | 24246200 |
| **Application Number:** | 14847537 |
| **International Application Number:** | |
| **Confirmation Number:** | 3161 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Customer Number:** | 111285 |
| **Filer:** | Tadd Fjelp Wilson/Amy Duarte |
| **Filer Authorized By:** | Tadd Fjelp Wilson |
| **Attorney Docket Number:** | 6583-440-CON |
| **Receipt Date:** | 02-DEC-2015 |
| **Filing Date:** | 08-SEP-2015 |
| **Time Stamp:** | 18:27:40 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

| | |
|---|---|
| Submitted with Payment | no |

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | Request for Corrected Filing Receipt | 6583-440-CON_Request_Corrected_FR.pdf | 113329<br>395a41b73231122ebce91e6f63669b6f78b8ac1c | no | 1 |

| | |
|---|---|
| **Warnings:** | |
| **Information:** | |

| | | | | | |
|---|---|---|---|---|---|
| 2 | Oath or Declaration filed | 6583-436_Executed_Declaration-SIRPAL.pdf | 149272<br>f3b4b276de78b0b11de20bd32ba8f9844f6e7880 | no | 1 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| 3 | Application Data Sheet | 6583-440-CON_ADS-Corrected2.pdf | 3094006<br>da92511f584cf362eb0b91326f7c2401e103e0a9 | no | 16 |
| **Warnings:** | | | | | |
| **Information:** | | | | | |
| This is not an USPTO supplied ADS fillable form | | | | | |
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**New Applications Under 35 U.S.C. 111**
**If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application.**

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

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

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| APPLICATION NUMBER | FILING or 371(c) DATE | GRP ART UNIT | FIL FEE REC'D | ATTY.DOCKET.NO | TOT CLAIMS | IND CLAIMS |
|---|---|---|---|---|---|---|
| 14/847,537 | 09/08/2015 | 2426 | 1740 | 6583-440-CON | 20 | 3 |

**CONFIRMATION NO. 3161**

**CORRECTED FILING RECEIPT**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

OC000000079102329

Date Mailed: 12/08/2015

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

**Inventor(s)**

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Saulo Correia Dourado, Oakville, CANADA;
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**Applicant(s)**

Flextronics AP, LLC, San Jose, CA;

**Power of Attorney:** The patent practitioners associated with Customer Number 111285

**Domestic Priority data as claimed by applicant**

This application is a CON of 13/970,427 08/19/2013 ABN
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

This application 14/847,537
is a CON of 13/970,388 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
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and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,409 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
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and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and said 13/970,409
claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,420 08/19/2013
which claims benefit of 61/684,672 08/17/2012
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and claims benefit of 61/736,692 12/13/2012
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and claims benefit of 61/805,053 03/25/2013

and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,442 08/19/2013 PAT 9185325
which claims benefit of 61/684,672 08/17/2012 *
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
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and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013
This application 14/847,537
is a CON of 13/970,450 08/19/2013 PAT 9167187
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
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and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
(*)Data provided by applicant is not consistent with PTO records.
and said 13/970,450
claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

**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:** No

**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:** 09/21/2015
The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 14/847,537**
**Projected Publication Date:** 03/03/2016
**Non-Publication Request:** No
**Early Publication Request:** No
**Title**

SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION

**Preliminary Class**

725

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

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Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

Almost every country has its own patent law, and a person desiring a patent in a particular country must make an application for patent in that country in accordance with its particular laws. Since the laws of many countries differ in various respects from the patent law of the United States, applicants are advised to seek guidance from specific foreign countries to ensure that patent rights are not lost prematurely.

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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).

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## Title 37, Code of Federal Regulations, 5.11 & 5.15

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**NOT GRANTED**

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www.uspto.gov

| APPLICATION NUMBER | FILING OR 371(C) DATE | FIRST NAMED APPLICANT | ATTY. DOCKET NO./TITLE |
|---|---|---|---|
| 14/847,537 | 09/08/2015 | Mohammed Selim | 6583-440-CON |

**CONFIRMATION NO. 3161**

111285
Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

**PUBLICATION NOTICE**




**Title:**SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION

**Publication No.**US-2016-0066023-A1
**Publication Date:**03/03/2016

## NOTICE OF PUBLICATION OF APPLICATION

The above-identified application will be electronically published as a patent application publication pursuant to 37 CFR 1.211, et seq. The patent application publication number and publication date are set forth above.

The publication may be accessed through the USPTO's publically available Searchable Databases via the Internet at www.uspto.gov. The direct link to access the publication is currently http://www.uspto.gov/patft/.

The publication process established by the Office does not provide for mailing a copy of the publication to applicant. A copy of the publication may be obtained from the Office upon payment of the appropriate fee set forth in 37 CFR 1.19(a)(1). Orders for copies of patent application publications are handled by the USPTO's Office of Public Records. The Office of Public Records can be reached by telephone at (703) 308-9726 or (800) 972-6382, by facsimile at (703) 305-8759, by mail addressed to the United States Patent and Trademark Office, Office of Public Records, Alexandria, VA 22313-1450 or via the Internet.

In addition, information on the status of the application, including the mailing date of Office actions and the dates of receipt of correspondence filed in the Office, may also be accessed via the Internet through the Patent Electronic Business Center at www.uspto.gov using the public side of the Patent Application Information and Retrieval (PAIR) system. The direct link to access this status information is currently http://pair.uspto.gov/. Prior to publication, such status information is confidential and may only be obtained by applicant using the private side of PAIR.

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

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Office of Data Managment, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
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www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---|---|---|---|
| 14/847,537 | 09/08/2015 | Mohammed Selim | 6583-440-CON | 3161 |

111285 7590 03/25/2016

Sheridan Ross P.C.
1560 Broadway
Suite 1200
Denver, CO 80202

| EXAMINER | |
|---|---|
| SAINT CYR, JEAN D | |

| ART UNIT | PAPER NUMBER |
|---|---|
| 2425 | |

| NOTIFICATION DATE | DELIVERY MODE |
|---|---|
| 03/25/2016 | 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):

flexpatents@sheridanross.com
edocket@sheridanross.com

| Office Action Summary | Application No. 14/847,537 | Applicant(s) SELIM ET AL. | |
|---|---|---|---|
| | Examiner JEAN D. SAINT CYR | Art Unit 2425 | 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 _____.

☐ 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) *16 and 17* 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) *17-22; 28-29; 32-34* is/are rejected.

8)☒ Claim(s) *23-27; 30-31; 35-36* 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 *09/08/2016* 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 _____.

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

4) ☐ Other: _____.

## DETAILED ACTION

The present application, filed on or after March 16, 2013, is being examined under the first inventor to file provisions of the AIA.

### Objection to claims

Claims 23-27, 30-31 and 35-36 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.

### Objections

In claims 32-36, the applicant uses the term “VOD” without spelling out that term. Appropriate correction is required.

### *Claim Rejections - 35 USC § 103*

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 of this title, 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.

Claims 17-18; 32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Baumgartner (20110167452) et al in view of Ueda et al, US No. 20060117365.

Re claim 17, Baumgartner et al disclose a method for providing video-on-demand (VOD) in an intelligent television, the method comprising: receiving, by a processor of the intelligent television, a first selection for VOD content(see fig.6 and fig.24; a user may control the control circuitry 106 using user input interface 118. The user input interface 118 may be any suitable user interface, such as a mouse, trackball, keypad, keyboard, touch screen, touch pad, voice recognition interface, remote control, etc, 0098; a user may access the VOD listings screen by selecting an on-screen menu option on a suitable program guide menu, by pressing a dedicated button on a remote control, or by using other suitable user interface arrangements, 0009);

in response to the first selection, providing a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content(see fig.24 and 26; a user may access the VOD listings screen by selecting an on-screen menu option on a suitable program guide menu, by pressing a dedicated button on a remote control, or by using other suitable user interface arrangements,0009; Vendor-specific screens may be displayed by the interactive television application in response to a user's selection or action. For example, in response to the user selecting the "VIDEO-ON-DEMAND" option 128 of

FIG. 7 or pressing a VOD key on the remote control, the interactive television application may display a video-on-demand vendor selection screen,0165);

receiving a second selection for VOD content; in response to the second selection, providing a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic (see fig.25 and fig.26; The user may select "Starz On Demand" by positioning highlight 334 on option 324 and pressing the "OK" button on the remote control. In response, the interactive television application may display a Starz-specific interface menu. Other content, such as advertisements, video clips, trailers, or previews, may also be displayed may also be displayed in window 336, 0166-0169);

receiving a third selection for VOD content; and in response to the third selection, providing either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content(see fig.27 where the description of the selected program is displayed on the screen; in response to the user selecting one of options 348-364, the interactive television application may display another Starz-specific interface, the interactive television application may display additional menu options (e.g., additional categories of on-demand media, additional features,0170; Screen 386 may include video-on-demand titles 388-394, as well as additional category options 396-402. Some of the labels (e.g., programs and categories) of foregoing options 388-402 may be provided by the vendor. For example, the vendor

may provide actual titles for labeling options 388-394, 0176; 0177; 0074; 0117; program description region 186 may be used to display information on the selected program such as title information, ratings information, plot summary information, information about actors, genre, critics ratings, etc,0118).

But did not explicitly disclose wherein the digest view presents information about a set of VOD content that are associated with a series.

However, Ueda et al disclose wherein the digest view presents information about a set of VOD content that are associated with a series (Sumo and baseball digest programs are good examples. Such digest version is often broadcast in so-called sports news programs,0023; in a video distribution service using stream data, the sequence information related to the stream data may be created and provided by a service provider other than the user, so that a common user can always enjoy the digest (or appropriately edited stream data) of the stream data, simply by obtaining the sequence data,0086-0088; when streams of broadcast related to soccer game are stored, and digest sequence information created to selectively reproduce only the digest scenes of the game is obtained from a different digest information distributor, it becomes possible to reproduce a digest version of the soccer game,0147; when a user wishes to reproduce a digest version of a broadcast program recorded by the user based on a piece of sequence information,0161).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Ueda to modify Baumgartner for the purpose of displaying data associated with contents in digest views.

Re claim 18, Baumgartner et al disclose an intelligent television system comprising: a memory operable to store video-on-demand (VOD) content (see fig.6, element 112);

a processor in communication with the memory, the processor operable to execute a user interface application operable to (see fig.6, element 110; a user may control the control circuitry 106 using user input interface 118. The user input interface 118 may be any suitable user interface, such as a mouse, trackball, keypad, keyboard, touch screen, touch pad, voice recognition interface, remote control,0098);

receive a first selection for VOD content; in response to the first selection, provide a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content (see fig.25 and fig.26; The user may select "Starz On Demand" by positioning highlight 334 on option 324 and pressing the "OK" button on the remote control. In response, the interactive television application may display a Starz-specific interface menu. Other content, such as advertisements, video clips, trailers, or previews, may also be displayed may also be displayed in window 336, 0166-0169; A user may access the VOD listings screen by selecting an on-screen menu option on a suitable program guide menu, by pressing a

dedicated button on a remote control, or by using other suitable user interface arrangements, 0009; Vendor-specific screens may be displayed by the interactive television application in response to a user's selection or action. For example, in response to the user selecting the "VIDEO-ON-DEMAND" option 128 of FIG. 7 or pressing a VOD key on the remote control, the interactive television application may display a video-on-demand vendor selection screen,0165);

receive a second selection for VOD content; in response to the second selection, provide a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic (see fig.25 and fig.26; The user may select "Starz On Demand" by positioning highlight 334 on option 324 and pressing the "OK" button on the remote control. In response, the interactive television application may display a Starz-specific interface menu. Other content, such as advertisements, video clips, trailers, or previews, may also be displayed may also be displayed in window 336, 0166-0169);

receive a third selection for VOD content; and in response to the third selection, provide either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content(see fig.27 where the description of the selected program is displayed on the screen; in response to the user selecting one of options 348-364, the interactive television application may display another Starz-specific interface, the interactive television application may display

additional menu options (e.g., additional categories of on-demand media, additional features,0170; Screen 386 may include video-on-demand titles 388-394, as well as additional category options 396-402. Some of the labels (e.g., programs and categories) of foregoing options 388-402 may be provided by the vendor. For example, the vendor may provide actual titles for labeling options 388-394, 0176; 0177; 0074; 0117; program description region 186 may be used to display information on the selected program such as title information, ratings information, plot summary information, information about actors, genre, critics ratings, etc,0118).

But did not explicitly disclose wherein the digest view presents information about a set of VOD content that are associated with a series.

However, Ueda et al disclose wherein the digest view presents information about a set of VOD content that are associated with a series (Sumo and baseball digest programs are good examples. Such digest version is often broadcast in so-called sports news programs,0023; in a video distribution service using stream data, the sequence information related to the stream data may be created and provided by a service provider other than the user, so that a common user can always enjoy the digest (or appropriately edited stream data) of the stream data, simply by obtaining the sequence data,0086-0088; when streams of broadcast related to soccer game are stored, and digest sequence information created to selectively reproduce only the digest scenes of the game is obtained from a different digest information distributor, it becomes possible

to reproduce a digest version of the soccer game,0147; when a user wishes to reproduce a digest version of a broadcast program recorded by the user based on a piece of sequence information,0161).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Ueda to modify Baumgartner for the purpose of displaying data associated with contents in digest views.

Re claim 32, is met as previously discussed with respect to the rejection of claim 17.

Claims 19-22; 28-29; 33-34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Baumgartner (20110167452) et al in view of Ueda et al, US No. 20060117365.

Re claim 19, Baumgartner et al disclose further comprising determining if the selection in the collection view is for a series or one of a movie or single show(Selecting a desired video-on-demand title 230 from title selection screen 222 may direct the interactive television application to display a video-on-demand information screen such as information screen 232 of FIG. 17a. Screen 232 may include information 236 on the selected video-on-demand content, such as title, run time, price, rating, and a description of the selected video-on-demand content,0127);

if the selection in the collection view is for one of a movie or single show, providing a

detail view (If the user has highlighted a particular program listing, for example, pressing the info button 90 may direct the interactive television application to provide additional program schedule information related to that program listing (e.g., a program summary, actor information, 0084; 0118; 0127).

But did not explicitly disclose if the selection in the collection view is for a series, providing the digest view.

However, Cordray et al disclose if the selection in the collection view is for a series(see fig.5 and fig.6 and fig.10; Program listing 504 includes scheduled aggregation icon 506 to indicate that an episode that is identified in that listing is scheduled to be recorded as part of a series aggregation. Scheduled aggregation icon 506 may be displayed for a particular episode, for example, when a user has selected that episode to be included as part of a series aggregation,0084-0086;0090; Series aggregation list display screen 1000 includes episode listings such as listing 1002 that may include episode descriptions and any other information for episodes in a series aggregation.,0106-0107).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Cordray to modify Baumgartner for the purpose of allowing users to receive more information associated with series.

And Ueda et al disclose providing the digest view (Sumo and baseball digest programs are good examples. Such digest version is often broadcast in so-called sports news programs,0023; in a video distribution service using stream data, the sequence information related to the stream data may be created and provided by a service provider other than the user, so that a common user can always enjoy the digest (or appropriately edited stream data) of the stream data, simply by obtaining the sequence data,0086-0088; when streams of broadcast related to soccer game are stored, and digest sequence information created to selectively reproduce only the digest scenes of the game is obtained from a different digest information distributor, it becomes possible to reproduce a digest version of the soccer game,0147; when a user wishes to reproduce a digest version of a broadcast program recorded by the user based on a piece of sequence information,0161).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Ueda to modify the combination of Baumgartner and Cordray for the purpose of displaying data associated with contents in digest views.

Re claim 20, the combination of Baumgartner and Ueda et al did not explicitly disclose wherein the digest view provides a listing of two or more episodes associated with the series.

However, Cordray et al disclose wherein the digest view provides a listing of two or more episodes associated with the series (see fig.10; series aggregation list display screen 1000 may list all episodes that are in the series aggregation, and may include episodes that have not been scheduled to be recorded, episodes that have been recorded, or episodes that have been scheduled to be recorded, 0106; 0109-0110).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Cordray to modify the combination of Baumgartner and Ueda for the purpose of displaying episodes data associated with series.

Re claim 21, the combination of Baumgartner and Ueda et al did not explicitly disclose further comprising: receiving a fourth selection of an episode in the digest view; and in response to the fourth selection, providing a player to present the episode to the user.

However, Cordray et al disclose further comprising: receiving a fourth selection of an episode in the digest view; and in response to the fourth selection, providing a player to present the episode to the user(user- or application-selection of episodes of a series, the series aggregation may be episodes from one or more seasons of a series, a user- or application-selection of episodes of a series, or any other desired group of episodes, 0007; 0018; 0047; see fig.15, television; Equipment 1410 may also include a television

1508, 0154; the output of recording device 1506 may be provided to television 1508 for display to the user, 0163; a viewer of an episode of a series such as a television series may wish to access episodes of the series that the viewer missed when they were originally broadcast, abstract;).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Cordray to modify the combination of Baumgartner and Ueda for the purpose of allowing users to receive episodes data associated with series.

Re claim 22, Baumgartner et al disclose further comprising: receiving a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, providing a player to present the movie or single show to the user(A user may access the VOD listings screen by selecting an on-screen menu option on a suitable program guide menu, by pressing a dedicated button on a remote control, or by using other suitable user interface arrangements,0009-0010; see fig.6, element 114; Television programming and other video and on-screen options and information may be displayed on display 114. Display 114 may be a monitor, a television, or any other suitable equipment for displaying visual images. Speakers 116 may be provided as part of a television or may be stand-alone units. Digital music and the audio component of videos displayed on display 114 may be played through speakers 116, 0097).

Re claim 28, Baumgartner et al disclose wherein the user interface application is further operable to: determine if the selection in the collection view is for a series or one of a movie or single show (Selecting a desired video-on-demand title 230 from title selection screen 222 may direct the interactive television application to display a video-on-demand information screen such as information screen 232 of FIG. 17a. Screen 232 may include information 236 on the selected video-on-demand content, such as title, run time, price, rating, and a description of the selected video-on-demand content,0127);

if the selection in the collection view is for one of a movie or single show, provide a detail view(If the user has highlighted a particular program listing, for example, pressing the info button 90 may direct the interactive television application to provide additional program schedule information related to that program listing (e.g., a program summary, actor information,0084;0118; 0127);

But did not explicitly disclose if the selection in the collection view is for a series, provide the digest view, wherein the digest view provides a listing of two or more episodes associated with the series; receive a fourth selection of an episode in the digest view; and in response to the fourth selection, provide a player to present the episode to the user.

However, Ueda et al disclose provide the digest view (Sumo and baseball digest programs are good examples. Such digest version is often broadcast in so-called sports news programs,0023; in a video distribution service using stream data, the sequence information related to the stream data may be created and provided by a service provider other than the user, so that a common user can always enjoy the digest (or appropriately edited stream data) of the stream data, simply by obtaining the sequence data,0086-0088; when streams of broadcast related to soccer game are stored, and digest sequence information created to selectively reproduce only the digest scenes of the game is obtained from a different digest information distributor, it becomes possible to reproduce a digest version of the soccer game,0147; when a user wishes to reproduce a digest version of a broadcast program recorded by the user based on a piece of sequence information,0161).

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Ueda to modify Baumgartner for the purpose of displaying data associated with contents in digest views.

And Cordray et al disclose program listing 504 includes scheduled aggregation icon 506 to indicate that an episode that is identified in that listing is scheduled to be recorded as part of a series aggregation. Scheduled aggregation icon 506 may be displayed for a particular episode, for example, when a user has selected that episode to be included as part of a series aggregation,0084-0086;0090; Series aggregation list display screen

1000 includes episode listings such as listing 1002 that may include episode descriptions and any other information for episodes in a series aggregation.,0106-0107.

It would have been obvious for any person of ordinary skill in the art at that time the invention was filed to incorporate the teachings of Cordray to modify the combination of Baumgartner and Ueda for the purpose of displaying episodes associated with series.

Re claim 29, Baumgartner et al disclose wherein the user interface application is further operable to: receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user(A user may access the VOD listings screen by selecting an on-screen menu option on a suitable program guide menu, by pressing a dedicated button on a remote control, or by using other suitable user interface arrangements, 0009-0010; see fig.6, element 114; Television programming and other video and on-screen options and information may be displayed on display 114. Display 114 may be a monitor, a television, or any other suitable equipment for displaying visual images. Speakers 116 may be provided as part of a television or may be stand-alone units. Digital music and the audio component of videos displayed on display 114 may be played through speakers 116, 0097).

Re claim 33, is met as previously discussed with respect to the rejection of claim 28.

Re claim 34, is met as previously discussed with respect to the rejection of claim 29.

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jean Duclos Saintcyr whose phone number is 571-270-3224. The examiner can normally reach on M-F 7:30-5:00 PM EST.If attempts to reach the examiner by telephone are not successful, his supervisor, Brian Pendleton, can be reach on 571-272-7527. The fax number for the organization where the application or proceeding is assigned is 571-273-8300. Information regarding the status of an application may be obtained from the Patent Application Retrieval (PAIR) system. Status information for published applications may be obtained from either private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see htpp://pair-direct.uspto.gov. Should you have questions on access to the private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197(toll free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, dial 800-786-9199(IN USA OR CANADA) or 571-272-1000.

/JEAN D SAINT CYR/

Examiner, Art Unit 2425

| Notice of References Cited | Application/Control No. 14/847,537 | Applicant(s)/Patent Under Reexamination SELIM ET AL. | |
|---|---|---|---|
| | Examiner JEAN D. SAINT CYR | Art Unit 2425 | Page 1 of 1 |

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| * | B | US-2012/0033950 A1 | 02-2012 | Cordray; Charles | H04N5/782 | 386/296 |
| * | C | US-2006/0117365 A1 | 06-2006 | Ueda; Toru | G11B27/031 | 725/112 |
| | D | US- | | | | |
| | E | US- | | | | |
| | F | US- | | | | |
| | G | US- | | | | |
| | H | US- | | | | |
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| | J | US- | | | | |
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| | L | US- | | | | |
| | M | US- | | | | |

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**NON-PATENT DOCUMENTS**

| * | | Include as applicable: Author, Title Date, Publisher, Edition or Volume, Pertinent Pages) |
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| | U | |
| | V | |
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*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.

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# BIB DATA SHEET

**CONFIRMATION NO. 3161**

| SERIAL NUMBER | FILING or 371(c) DATE | CLASS | GROUP ART UNIT | ATTORNEY DOCKET NO. |
|---|---|---|---|---|
| 14/847,537 | 09/08/2015<br>RULE | 725 | 2425 | 6583-440-CON |

**APPLICANTS**
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**INVENTORS**
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Saulo Correia Dourado, Oakville, CANADA;
Sanjiv Sirpal, Oakville, CANADA;

**** CONTINUING DATA ***************************

This application is a CON of 13/970,427 08/19/2013 ABN
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
and claims benefit of 61/804,998 03/25/2013
and claims benefit of 61/804,971 03/25/2013
and claims benefit of 61/804,990 03/25/2013
and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

This application 14/847,537 09/08/2015
is a CON of 13/970,388 08/19/2013
which claims benefit of 61/684,672 08/17/2012
and claims benefit of 61/702,650 09/18/2012
and claims benefit of 61/697,710 09/06/2012
and claims benefit of 61/700,182 09/12/2012
and claims benefit of 61/736,692 12/13/2012
and claims benefit of 61/798,821 03/15/2013
and claims benefit of 61/804,942 03/25/2013
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and claims benefit of 61/805,003 03/25/2013
and claims benefit of 61/805,053 03/25/2013
and claims benefit of 61/805,030 03/25/2013
and claims benefit of 61/805,027 03/25/2013
and claims benefit of 61/805,042 03/25/2013
and claims benefit of 61/805,038 03/25/2013

This application 14/847,537 09/08/2015
is a CON of 13/970,409 08/19/2013

| Index of Claims | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14847537 | SELIM ET AL. |
| | Examiner | Art Unit |
| | JEAN D SAINT CYR | 2425 |

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|---|---|---|---|---|---|---|---|
| ✓ | 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 | | | | | | | | |
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| Final | Original | 03/18/2016 | | | | | | | | |
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| | 36 | O | | | | | | | | |

**EAST Search History**

**EAST Search History (Prior Art)**

| Ref # | Hits | Search Query | DBs | Default Operator | Plurals | Time Stamp |
|---|---|---|---|---|---|---|
| L1 | 2 | "20110167452" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 16:45 |
| L2 | 6 | "20100088724" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:12 |
| L3 | 15 | (digest near3(window view)) same (vod on$demand) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:15 |
| L4 | 15 | 3 and ((@ad<="20120817") (@rlad<="20120817") (@prad<="20120817")) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:15 |
| L5 | 17 | (digest near3(window view)) same(series) and (vod on$demand) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:16 |
| L6 | 17 | 5 and ((@ad<="20120817") (@rlad<="20120817") (@prad<="20120817")) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:16 |
| L7 | 86 | (digest near3(window view)) and(series) and (vod on$demand) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:17 |
| L8 | 72 | 7 and ((@ad<="20120817") | US-PGPUB; | OR | ON | 2016/03/18 |

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| L9 | 4 | "20060117365" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 17:47 |
| L10 | 6 | "20120033950" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 18:58 |
| L11 | 1 | "14847537" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2016/03/18 22:15 |
| S1 | 3 | "20100306806" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:43 |
| S2 | 5 | "20100050219" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:44 |
| S3 | 2 | "20110167452" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:45 |
| S4 | 2 | "20100153997" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:46 |
| S5 | 3 | "20080276275" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; | OR | OFF | 2014/09/17 10:47 |

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| | | | IBM_TDB | | | |
| S6 | 4 | "20070101375" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:47 |
| S7 | 2 | "20110252446" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:49 |
| S8 | 4 | "20110131506" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:50 |
| S9 | 9 | "20050091596" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:52 |
| S10 | 3 | "20060101504" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:55 |
| S11 | 5 | "20110074591" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:57 |
| S12 | 2 | "20110289067" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 10:59 |
| S13 | 2 | "20110289419" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 11:04 |
| S14 | 2 | "20120200574" | US-PGPUB; USPAT; USOCR; FPRS; | OR | OFF | 2014/09/17 11:04 |

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| | | | EPO; JPO; DERWENT; IBM_TDB | | | |
| S15 | 4 | "20070101375" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 11:51 |
| S16 | 3 | "20080276275" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 11:51 |
| S17 | 2 | "20110289419" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 11:52 |
| S18 | 2 | "20120200574" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 11:53 |
| S19 | 0 | ((select$3 choss$3 input$4) near3 (series near3(vod on$demand)))same ((present$3 display$3 render$3)near3(digest summary description details)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 17:46 |
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| S21 | 0 | ((select$3 choss$3 input$4) near3 (series near3(vod on$demand)))with(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 17:47 |
| S22 | 0 | ((select$3 choss$3 input$4) near3 (series near3(vod on$demand)))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 17:48 |
| S23 | 0 | ((select$3 choss$3 input$4) near3 series near4(vod on$demand))same(digest | US-PGPUB; USPAT; | OR | OFF | 2014/09/17 17:48 |

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| | | summary description details) | USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | | | |
| S24 | 88 | ((select$3 choss$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 17:49 |
| S25 | 158 | ((select$3 choss$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2014/09/17 17:49 |
| S26 | 88 | ((select$3 choss$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/17 17:49 |
| S27 | 158 | ((select$3 choss$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2014/09/17 17:49 |
| S28 | 126 | S27 and ((@ad<="20120817") (@rlad<="20120817") (@prad<="20120817")) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2014/09/17 17:55 |
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| S30 | 4 | "20130014159" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2014/09/18 14:20 |
| S31 | 168 | ((select$3 choss$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 11:36 |

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| S32 | 170 | ((select$3 choos$3 input$4) near3 series near4(vod video program on$demand))same(digest summary description details) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 11:37 |
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| S35 | 1 | S32 and ((@ad<="20120817") (@rlad<="20120817") (@prad<="20120817"))and (digest near3 series) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 12:47 |
| S36 | 42 | ((@ad<="20120817") (@rlad<="20120817") (@prad<="20120817"))and (digest near3(data information ) near3 series) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 12:48 |
| S37 | 0 | (digest near3(view window))with( series near3(video vod on$demand)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 13:14 |
| S38 | 0 | (digest near3(view window))same( series near3(video vod on$demand)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 13:14 |
| S39 | 4 | (digest near4(series near3(video vod on$demand))) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 13:15 |
| S40 | 56 | (digest near3(view window))same( (data information) near3(video vod on$demand)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; | OR | ON | 2015/04/30 13:33 |

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| S43 | 2 | "20110167452" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 14:53 |
| S44 | 6 | "20100088724" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 17:19 |
| S45 | 5 | "20120033950" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | ON | 2015/04/30 18:32 |
| S46 | 5 | "20090106793" | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2015/04/30 19:39 |
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| | | H04N21/4858 or H04N21/8133 or H04N5/445 or H04N21/433 or H04N21/6125 or H04N21/47202 or H04N21/4882 or H04N21/435 or H04N21/4316 or G06F3/0481 or H04N21/488 or H04N21/6175 or H04N21/8173 or H04N21/4821 or H04N21/478 or H04N21/84 or H04N21/482 or H04N5/50 or H04N21/4755 or H04N21/8166 or H04N21/4307 or H04N21/4823 or H04N21/4622 or H04N21/8358 or H04N21/26291 or H04N17/04 or H04N21/485 or H04N21/472 or H04N21/4828 or H04N21/44213 or H04N21/437 or H04N5/4403 or H04N2005/4432 or H04N2005/4407 or H04N2005/4414 or H04N21/42219 or H04N21/4332 or G06F2203/04804).cpc. | | | | |
| S48 | 4527 | S47 and ((intelligent smart) near3(tv television)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 11:53 |
| S49 | 1229 | S48 and (vod On$demand) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 11:54 |
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| S51 | 252 | S50 and (CPU processor) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 11:57 |
| S52 | 188 | S51 and (series collection) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 11:58 |
| S53 | 15 | S52 and ((detail digest) near3 (view vindow)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 11:59 |
| S54 | 15 | S53 and ((@ad<="20120817") | US-PGPUB; | OR | ON | 2016/03/18 |

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| S55 | 107474 | S47 and ((tv television)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:21 |
| S56 | 14058 | S55 and (vod On$demand) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:22 |
| S57 | 1911 | S56 and ((input$4 select$3) near3(vod On$demand)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:22 |
| S58 | 1522 | S57 and (CPU processor) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:22 |
| S59 | 1067 | S58 and (series collection) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:23 |
| S60 | 24 | S59 and ((detail digest) near3 (view vindow)) | US-PGPUB; USPAT; USOCR; FPRS; EPO; JPO; DERWENT; IBM_TDB | OR | OFF | 2016/03/18 12:23 |
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| Search Notes | Application/Control No. | Applicant(s)/Patent Under Reexamination |
|---|---|---|
| | 14847537 | SELIM ET AL. |
| | Examiner | Art Unit |
| | JEAN D SAINT CYR | 2425 |

| CPC- SEARCHED | | |
|---|---|---|
| Symbol | Date | Examiner |
| CPC and keywords search | 03/17/2016 to 03/18/2016 | JDS |

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

| US CLASSIFICATION SEARCHED | | | |
|---|---|---|---|
| Class | Subclass | Date | Examiner |
| | | | |

| SEARCH NOTES | | |
|---|---|---|
| Search Notes | Date | Examiner |
| Keywords search | 03/17/2016 to 03/18/2016 | JDS |

| INTERFERENCE SEARCH | | | |
|---|---|---|---|
| US Class/ CPC Symbol | US Subclass / CPC Group | Date | Examiner |
| | | | |

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

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|---|---|
| In Re the Application of:<br>Mohammed Selim | Group Art Unit: 2425 |
| Application No.: 14/847,537 | Examiner: Saint Cyr, Jean D |
| Filed: September 8, 2015 | Confirmation No.: 3161 |
| Atty. File No.: 6583-440-CON | |

For: "SYSTEMS AND METHODS FOR PROVIDING SOCIAL MEDIA WITH AN INTELLIGENT TELEVISION"

**AMENDMENT AND RESPONSE**

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

Commissioner:

Applicants submit this Amendment and Response to address the Non-final Office Action having a mailing date of March 25, 2016. Please credit any overpayment or charge any underpayment to Deposit Account No. 19-1970.

Please amend the above-identified patent application as follows:

**Amendments to the Claims** are shown in the listing of claims which begins on page 2 of this paper.

**Remarks** begin on page 8 of this paper.

***Amendments to the Claims:***

This listing of claims will replace all prior versions, and listings, of claims in the application:

***Listing of Claims:***

1-16. (Canceled)

17. (Currently Amended) A method for providing video-on-demand (VOD) in an intelligent television, the method comprising:

receiving, by a processor of the intelligent television, a first selection for VOD content; in response to the first selection, providing a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

receiving a second selection for VOD content;

in response to the second selection, providing a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

receiving a third selection for VOD content; ~~and~~

in response to the third selection, providing either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series, wherein providing either a detail view or a digest view of the VOD content comprises:

determining if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, providing the digest view; and

if the selection in the collection view is for one of a movie or single show, providing a detail view, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

18. (Currently Amended) An intelligent television system comprising: a memory operable to store video-on-demand (VOD) content;

a processor in communication with the memory, the processor operable to:

execute a user interface application operable to:

receive a first selection for VOD content;

in response to the first selection, provide a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

receive a second selection for VOD content;

in response to the second selection, provide a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

receive a third selection for VOD content; ~~and~~

in response to the third selection, provide either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series, wherein providing either a detail view or a digest view of the VOD content comprises:

determine if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, provide the digest view, wherein the digest view provides a listing of two or more episodes associated with the series;

if the selection in the collection view is for one of a movie or single show, provide a detail view;

receive a fourth selection of an episode in the digest view;

in response to the fourth selection, provide a player to present the episode to the user; and

receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a

second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

19. Cancelled

20. (Currently Amended) The method as defined in claim ~~19~~17, wherein the digest view provides a listing of two or more episodes associated with the series.

21. (Previously Presented) The method as defined in claim 20, further comprising:

receiving a fourth selection of an episode in the digest view; and

in response to the fourth selection, providing a player to present the episode to the user.

22. (Previously Presented) The method as defined in claim 21, further comprising:

receiving a fifth selection of a user interface device to play the movie or single show; and

in response to the fifth selection, providing a player to present the movie or single show to the user.

23. Cancelled

24. (Currently Amended) The method as defined in claim ~~23~~17, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria.

25. (Previously Presented) The method as defined in claim 24, wherein the master view includes a navigation bar to select between types of content.

26. (Previously Presented) The method as defined in claim 25, wherein the types of content include showcase content, movies content, television series content, or variety content.

27. (Previously Presented) The method as defined in claim 26, wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

28. Cancelled

29. Cancelled

30. Cancelled

31. (Currently Amended) The intelligent television system as defined in claim ~~30~~18, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.

32. (Currently Amended) A non-transitory computer readable medium having stored thereon processor executable instructions that cause a computing system to execute a method, the instructions comprising:

instructions to receive a first selection for video on demand (VOD) content;

in response to the first selection, instructions to provide a master view of VOD content, wherein the master view presents two or more collections of VOD content organized by a characteristic of the VOD content;

instructions to receive a second selection for VOD content;

in response to the second selection, instructions to provide a collection view of the VOD content, wherein the collection view presents two or more items of VOD content having the characteristic;

instructions to receive a third selection for VOD content; and

in response to the third selection, instructions to provide either a detail view or a digest view of the VOD content, wherein the detail view presents information about a selected item of

VOD content, and wherein the digest view presents information about a set of VOD content that are associated with a series wherein providing either a detail view or a digest view of the VOD content comprises:

determine if the selection in the collection view is for a series or one of a movie or single show;

if the selection in the collection view is for a series, provide the digest view, wherein the

digest view provides a listing of two or more episodes associated with the series;

if the selection in the collection view is for one of a movie or single show, provide a detail view;

receive a fourth selection of an episode in the digest view; and

in response to the fourth selection, provide a player to present the episode to the user;

receive a fifth selection of a user interface device to play the movie or single show; and in response to the fifth selection, provide a player to present the movie or single show to the user, wherein a navigation to view VOD content is an ordered set of user interfaces, and wherein the order includes a master view at a top level, a collection view at a second level, either a digest view or detail view at a third level, and a player view at a fourth and bottom level.

33. Cancelled

34. Cancelled

35. Cancelled

36. (Currently Amended) The computer readable medium as defined in claim ~~35~~32, wherein a master view includes at least two user-selectable devices to view a collection view based on one of two or more criteria, wherein the master view includes a navigation bar to select between types of content, wherein the types of content include showcase content, movies content, television series content, or variety content, and wherein the master layout

includes user-selectable devices for viewing a collection of content based on special topics, newest content, top watched content, recommended content, or favorites content.



Ex.1002 / Page 266 of 662
LG Electronics, Inc.

## REMARKS/ARGUMENTS

***Status of the Claims***

In the Office Action mailed March 25, 2016, claims 16 and 17 were pending in the application. Claims 17-22, 28-29, and 32-34 are rejected, and Claims 23-27, 30-31, and 35-36 are objected to. Claims 17, 18, 20, 24, 31, 32, and 36 are amended. Claims 19, 23, 28-30, and 33-35 have been cancelled. Therefore, claims 17-18, 20-22, 24-27, 31-32, and 36 are present for examination. No new matter has been added by these amendments. Claims 16, 17, and 32 are independent claims. Applicants respectfully request reconsideration of this application as amended.

***Claim Objections***

Claims 23-27, 30-31, and 35-36 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 clam and any intervening claims.

Claims 32-36, the applicant uses the term "VOD" without spelling out that term. Amendments to the claims have ameliorated these objections, and Applicant(s) respectfully request the withdrawal of these objections.

***Rejections Under 35 U.S.C. §103***

Claims 17, 18 and 32 are rejected under 35 U.S.C. §103(a) as being unpatentable over U.S. Pub. No. 2011/0167452 to Baumgartner et al. ("Baumgartner") in view of U.S. Pub. No. 2006/0117365 to Ueda et al. ("Ueda"). Claims 19-22, 28-29, and 33-34 are rejected under 35 U.S.C. §103(a) as being unpatentable over Baumgartner in view of Ueda.

Allowable material from claims 23, 30, and 35 have been incorporated into the independent claims. As such, all claims should now be allowable.

## CONCLUSION

In view of the foregoing, Applicants believe all claims now pending in this Application are in a condition for allowance. The issuance of a formal Notice of Allowance at an early date is respectfully requested. Applicants do not acquiesce to any objection, rejection, or argument not specifically addressed herein. Rather, the Applicants believe the amendments and arguments contained herein overcome all objections, rejections, or arguments.

If the Examiner believes a telephone conference would expedite prosecution of this application, please telephone the undersigned at (303) 863-2987.

The Commissioner is hereby authorized to charge to deposit account number 19-1970 any fees under 37 CFR § 1.16 and 1.17 that may be required by this paper and to credit any overpayment to that Account. If any extension of time is required in connection with the filing of this paper and has not been separately requested, such extension is hereby petitioned.

Respectfully submitted,

SHERIDAN ROSS P.C.

Date: June 27, 2016

By: /Tadd F. Wilson/

Tadd F. Wilson
Reg. No. 54,544
1560 Broadway, Suite 1200
Denver, Colorado 80202
Telephone: 303-863-9700

# Electronic Acknowledgement Receipt

| | |
|---|---|
| **EFS ID:** | 26188450 |
| **Application Number:** | 14847537 |
| **International Application Number:** | |
| **Confirmation Number:** | 3161 |
| **Title of Invention:** | SYSTEMS AND METHODS FOR PROVIDING VIDEO ON DEMAND IN AN INTELLIGENT TELEVISION |
| **First Named Inventor/Applicant Name:** | Mohammed Selim |
| **Customer Number:** | 111285 |
| **Filer:** | Tadd Fjelp Wilson/Kathy Johnston |
| **Filer Authorized By:** | Tadd Fjelp Wilson |
| **Attorney Docket Number:** | 6583-440-CON |
| **Receipt Date:** | 27-JUN-2016 |
| **Filing Date:** | 08-SEP-2015 |
| **Time Stamp:** | 18:53:46 |
| **Application Type:** | Utility under 35 USC 111(a) |

## Payment information:

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|---|---|
| Submitted with Payment | no |

## File Listing:

| Document Number | Document Description | File Name | File Size(Bytes)/ Message Digest | Multi Part /.zip | Pages (if appl.) |
|---|---|---|---|---|---|
| 1 | | AMEND_01_6583-440-CON.pdf | 139376<br>ad47f845449793c250eb810f94ca3aa17484240c | yes | 9 |

| | 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 | 9 |
| **Warnings:** | | | |
| **Information:** | | | |
| | **Total Files Size (in bytes):** | 139376 | |

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

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

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

PTO/SB/06 (09-11)
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U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE
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| PATENT APPLICATION FEE DETERMINATION RECORD<br>Substitute for Form PTO-875 | Application or Docket Number<br>14/847,537 | Filing Date<br>09/08/2015 | ☐ To be Mailed |
|---|---|---|---|

**ENTITY**: ☒ LARGE ☐ SMALL ☐ MICRO

## APPLICATION AS FILED – PART I

| | (Column 1) | (Column 2) | | |
|---|---|---|---|---|
| FOR | NUMBER FILED | NUMBER EXTRA | RATE ($) | FEE ($) |
| ☒ BASIC FEE (37 CFR 1.16(a), (b), or (c)) | N/A | N/A | N/A | **280** |
| ☐ 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 | **280** |

## APPLICATION AS AMENDED – PART II

| | | (Column 1) | | (Column 2) | (Column 3) | | |
|---|---|---|---|---|---|---|---|
| AMENDMENT | **06/27/2016** | CLAIMS REMAINING AFTER AMENDMENT | | HIGHEST NUMBER PREVIOUSLY PAID FOR | PRESENT EXTRA | RATE ($) | ADDITIONAL FEE ($) |
| | Total (37 CFR 1.16(i)) | * 12 | 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** |

| | | (Column 1) | | (Column 2) | (Column 3) | | |
|---|---|---|---|---|---|---|---|
| AMENDMENT | | CLAIMS REMAINING AFTER AMENDMENT | | HIGHEST NUMBER PREVIOUSLY PAID FOR | 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
GWENDOLYN MYERS

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.*

| Substitute for form 1449/PTO | | | | Complete if Known | |
|---|---|---|---|---|---|
| **INFORMATION DISCLOSURE STATEMENT BY APPLICANT** *(Use as many sheets as necessary)* | | | | Application Number | 14/847,537 |
| | | | | Filing Date | September 8, 2015 |
| | | | | First Named Inventor | Mohammed Selim |
| | | | | Art Unit | 2425 |
| | | | | Examiner Name | SAINT CYR, JEAN D |
| Sheet | 1 | of | 5 | Attorney Docket Number | 6583-440-CON |

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| Examiner Initials* | Cite No.[1] | Document Number Number-kind Code[2] (if known) | Publication Date MM-DD-YYYY | Name of Patentee or Applicant of Cited Document | Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear |
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| Examiner Signature | | Date Considered | |
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*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. [1] Applicant's unique citation designation number (optional). [2] See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. [3] Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. [6] Applicant is to place a check mark here if English language Translation is attached.

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| **INFORMATION DISCLOSURE STATEMENT BY APPLICANT** *(Use as many sheets as necessary)* | | | | Application Number | 14/847,537 |
| | | | | Filing Date | September 8, 2015 |
| | | | | First Named Inventor | Mohammed Selim |
| | | | | Art Unit | 2425 |
| | | | | Examiner Name | SAINT CYR, JEAN D |
| Sheet | 2 | of | 5 | Attorney Docket Number | 6583-440-CON |

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| Examiner Signature | | Date Considered | |
|---|---|---|---|

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| **INFORMATION DISCLOSURE STATEMENT BY APPLICANT** | | | | Application Number | 14/847,537 |
| | | | | Filing Date | September 8, 2015 |
| | | | | First Named Inventor | Mohammed Selim |
| *(Use as many sheets as necessary)* | | | | Art Unit | 2425 |
| | | | | Examiner Name | SAINT CYR, JEAN D |
| Sheet | 3 | of | 5 | Attorney Docket Number | 6583-440-CON |

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| | | | | Filing Date | September 8, 2015 |
| | | | | First Named Inventor | Mohammed Selim |
| | | | | Art Unit | 2425 |
| | | | | Examiner Name | SAINT CYR, JEAN D |
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| Examiner Initials* | Cite No.[1] | Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published. |
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| | | | | First Named Inventor | Mohammed Selim |
| | | | | Art Unit | 2425 |
| | | | | Examiner Name | SAINT CYR, JEAN D |
| Sheet | 5 | of | 5 | Attorney Docket Number | 6583-440-CON |

| | | |
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| | 123 | Official Action for U.S. Patent Application No. 13/970,420, mailed Oct. 09, 2014 (Attorney's Ref. No. 6583-439) 15 pages |
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| Examiner Signature | | Date Considered | |
|---|---|---|---|

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(19) Europäisches Patentamt
European Patent Office
Office européen des brevets

(11) EP 2 328 346 A1

# (12) EUROPEAN PATENT APPLICATION

(43) Date of publication:
**01.06.2011 Bulletin 2011/22**

(51) Int Cl.:
***H04N 7/16*** *(2011.01)* ***H04N 5/00*** *(2011.01)*

(21) Application number: **11151835.3**

(22) Date of filing: **15.12.2006**

(84) Designated Contracting States:
**AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR**

(30) Priority: **29.12.2005 US 324212 P**
**29.12.2005 US 324172 P**
**29.12.2005 US 324204 P**
**29.12.2005 US 324185 P**
**29.12.2005 US 324173 P**

(62) Document number(s) of the earlier application(s) in accordance with Art. 76 EPC:
**06847656.3 / 1 969 846**

(71) Applicant: **United Video Properties, Inc.**
**Tulsa, OK 74136 (US)**

(72) Inventors:
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**Berwyn, Pennsylvania 19312 (US)**

(74) Representative: **Bryn-Jacobsen, Caelia et al**
**Kilburn & Strode LLP**
**20 Red Lion Street**
**London WC1R 4PJ (GB)**

Remarks:
This application was filed on 24-01-2011 as a divisional application to the application mentioned under INID code 62.

## (54) Systems and Methods for Managing Content

(57) A "New to Me" feature is provided for an interactive media guidance system implemented as a home network having multiple user equipment devices. Functionally speaking, the "New to Me" feature of the interactive media guidance system identifies programs or advertisements that have been previously viewed by an individual user or a user equipment device within the home network, or even by a household. The interactive media guidance system may use the information gathered regarding the programs and/or advertisements that have already been seen by a user, device or household to, for example, remove the programs or advertisements from future displays of recommendations, search results or listings of available programming.

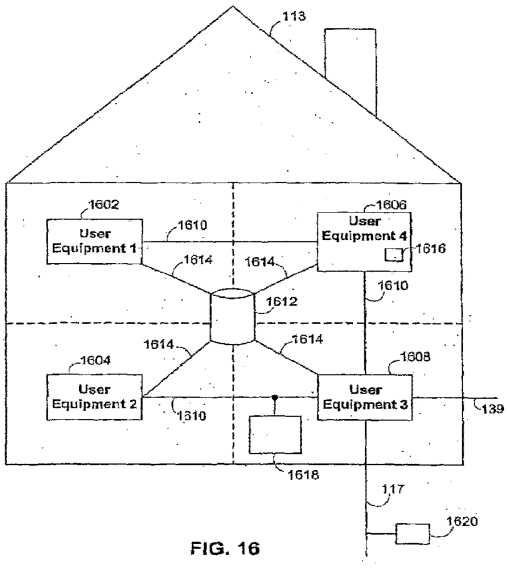



FIG. 16

EP 2 328 346 A1

## Description

### Background of the Invention

**[0001]** The present invention relates to systems and methods for managing content. More particularly, the present invention relates to generating interactive content presented to users based on programming viewed or played on user equipment devices that are networked together.

**[0002]** User equipment devices today may have the ability to, for example, take into account the content that a user has seen before when presenting interactive information to the user, or when performing an operation such as recording television programming at the user's direction. Such user equipment devices are aimed at being customizable to a particular user. However, with the advent of localized networks of user equipment devices, such as a home network of interconnected user equipment devices, users have a tendency to view media on many if not all of the user equipment devices in a given network on a regular basis. Beyond that, as user equipment devices become increasingly prevalent, users have a greater tendency to view media on user equipment devices that are outside of a home network, and yet that still may be connected to the overarching network to which user equipment devices in the home network are connected. It would therefore be desirable to provide a system for allowing network-connected user equipment devices to be customized to users based on users' viewing histories.

**[0003]** Furthermore, the ability of known systems to identify previously viewed content, and then make use of such information, is limited both in terms of breadth of functionality with which this information is utilized, and the depth of information concerning previously viewed content that is generated. For example, current television program guides provide features that include, among others, "Repeats", "First Run" and "Season Pass". The "Repeats" feature identifies a particular program that has been previously broadcast, regardless of whether or not that program has actually been watched by a specific viewer. The "First Run" feature identifies programming that is being broadcast or run for the very first time. The "Season Pass" feature, meanwhile, allows users to purchase an entire upcoming season of a program. Other features of such guides include recommendations, searches, and other interactive displays of content including programming, advertisements or other media. All of these features, however, currently do not enable users to view in a detailed manner, if at all, the extent to which the identified programs have been previously viewed. It would be desirable to provide users with such information in order to better help users identify the programming in which they have the most interest. Also, even those program guides that are presently capable of identifying previously viewed content provide little detail about the viewing history of such content, in addition to lacking sophisticated ways of representing such content. It would be desirable, therefore, to provide a system that is capable of providing a greater level of sophistication in connection with the viewing history and displays of previously viewed content.

### Summary of the Invention

**[0004]** The present invention addresses the above and other problems by providing systems and methods for managing the display of interactive content based on a viewing history for an individual, a device, or a home network. By managing content based on a viewing history for an individual, a device, or a home network, the present invention may efficiently accommodate the viewing habits of one or more users interacting with one or more user devices that are communicatively coupled to a home network, or are interacting with two or more home networks that are communicatively coupled to each other.

**[0005]** The viewing history may include compilation of content that has been displayed,'viewed, or played on at least one user device that is communicatively coupled to a home network. In addition, a viewing history may be created, modified, and updated for a particular user, a particular user device, or a home network. The viewing history may provide a framework or guideline for enabling an interactive media guidance application to generate interactive content. Interactive content may be content that is displayed by a interactive media guidance application such as, for example, listings of programming, advertisements, and information screens.

**[0006]** An advantage of the present invention is that the interactive content may be customized based on the viewing history. For example, the interactive media guidance system may display a list of programming that has not been viewed according to the viewing history. As another example, the interactive media guidance application may display advertisements that have not been viewed according to the viewing history.

**[0007]** Content management at an individual level within a home network may enable a media guidance application to provide interactive content that is specific to each user regardless of which user device the user uses. For example, when a first user views a particular program (e.g., a television show) in the living room, the viewing history for the first user may be updated to reflect the fact that the first user has viewed that particular program. Thereafter, when the first user retires to the bedroom (or any other room having a user device communicatively coupled to the home network), and decides to watch another program, the system may omit the listing of the particular program that the first user viewed in the living room from a listing of programs that may be displayed on a user device in the bedroom. In contrast, if a second user accesses the user device in either the living room or the bedroom and has not viewed the particular program viewed by the first user, the system may display the particular program in a listing for the second user.



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**[0008]** Content management at a user device level within a home network may enable a media guidance application to provide interactive content that is based on the content viewed at a selected user device. For example, a selected user device may be treated as the master and the other user devices may be treated as slaves. In a master/slave arrangement, the viewing history may be created, modified, or updated based on the content viewed at the master user device. Thus, the interactive content generated for display on both the master and slave devices is based on the viewing history of the master user device.

**[0009]** Content management at a home network level may enable a media guidance application to provide interactive content that is based on the content viewed at any one of several user devices communicatively coupled to a home network. In this arrangement, whenever an item of programming is viewed on a user device that is communicatively coupled to the home network, that program may not be presented in a listing of programming on that particular user device, nor any other user device that is communicatively coupled to the home network. For example, assume that a home network is communicatively coupled to three different user devices. If "Superman" is viewed on a first user device, a viewing history for the home network may be updated to reflect this viewing event. Thus, none of the user devices may display "Superman" in a listing of programming. If "Wonderwoman" is viewed on a second user device, the viewing history for the home network may be updated to reflect this viewing event. Again, none of the user devices may display "Wonderwoman" in a listing of programming.

**[0010]** Managing content across two or more home networks may enable the media guidance application to provide interactive content that is based on the content viewed at a selected home network. For example, a user may have a first home network (e.g., located at his or her house) and a second home network (e.g., located at his or her vacation house). In one embodiment, which assumes that the first home network is the selected home network, any item of programming that is viewed at the first home network may not be presented in a listing of programming at the second network.

## Brief Description of the Drawing

**[0011]** FIG. 1 is a diagram of an illustrative interactive television system in accordance with the present invention.

**[0012]** FIG. 2 is a diagram of illustrative user television equipment in accordance with the present invention.

**[0013]** FIG. 3 is a diagram of additional illustrative user television equipment in accordance with the present invention.

**[0014]** FIG. 4 is a diagram of an illustrative remote control in accordance with the present invention.

**[0015]** FIG. 5 is a diagram of illustrative user computer equipment in accordance with the present invention.

**[0016]** FIG. 6 is a generalized diagram of illustrative user equipment in accordance with the present invention.

**[0017]** FIG. 7 is a diagram of an illustrative home network in which a plurality of user equipment is implemented in a star configuration in accordance with the present invention.

**[0018]** FIG. 8a is a diagram of an illustrative home network in which a plurality of user equipment is implemented in a tree configuration in accordance with the present invention.

**[0019]** FIG. 8b is a diagram of an illustrative home network in which a plurality of user equipment is implemented in a ring configuration in accordance with the present invention.

**[0020]** FIG. 8c is a diagram of an illustrative home network in which a plurality of user equipment is implemented in a bus configuration in accordance with the present invention.

**[0021]** FIG. 9 is a diagram of an illustrative home network in which a plurality of user equipment and a server are implemented in a client-server configuration in accordance with the present invention.

**[0022]** FIG. 10 is a diagram of an illustrative home network in a client-server configuration and in which the set-top-box acts as the server in accordance with the present invention.

**[0023]** FIG. 11a is a diagram of a plurality of home networks implemented in an illustrative neighborhood node configuration in accordance with the present invention.

**[0024]** FIG. 11b is a diagram of an illustrative system in which servers are located at network nodes in accordance with the present invention.

**[0025]** FIG. 11c is a diagram of two illustrative home networks that have been interconnected in accordance with the present invention.

**[0026]** FIG. 11d is a diagram of two illustrative home networks that have been interconnected via a server in accordance with the present invention.

**[0027]** FIG. 12 shows several different types of content that may be monitored for creating, modifying, or updating a viewing history in accordance with the present invention.

**[0028]** FIG. 13 shows several monitors that may be used to track various aspects of the viewed or played content in accordance with the present invention.

**[0029]** FIG. 14 shows an illustrative display screen for allowing a user to manually enter previously viewed content in accordance with the present invention.

**[0030]** FIG. 15 shows an illustrative flow diagram in connection with allowing a user to manually enter previously viewed content in accordance with the present invention.

**[0031]** FIG. 16 is a diagram of an illustrative home network in which a plurality of user equipment devices are coupled to a local database server in accordance with the present invention.

**[0032]** FIG. 17 shows several different types of inter-



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active content that may be generated and displayed by an interactive media guidance application in accordance with the present invention.

**[0033]** FIG. 18a shows an illustrative flow diagram for displaying media content based on the viewing history of a user in a home network in accordance with the present invention.

**[0034]** FIG. 18b shows an illustrative flow diagram for updating a viewing history for several identified users in accordance with the present invention.

**[0035]** FIG. 18c shows an illustrative flow diagram for generating interactive contented based on a viewing history of a selected user devices in accordance with the present invention.

**[0036]** FIG. 18d shows an illustrative flow diagram for generating interactive content based on a viewing history of a home network in accordance with the present invention.

**[0037]** FIG. 18e shows an illustrative flow diagram for generating interactive content based on a selected one of at least two home networks in accordance with the present invention.

**[0038]** FIG. 19 shows an illustrative display screen for selecting a user profile at a user equipment device in a home network in accordance with the present invention.

**[0039]** FIG. 20 shows an illustrative flow diagram for displaying interactive content or media content based on a ranking process that is applied to previously viewed media content in accordance with the present invention.

**[0040]** FIG. 21a shows an illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0041]** FIG. 21b shows another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0042]** FIG. 21c shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0043]** FIG. 21d shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0044]** FIG. 21e shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0045]** FIG. 21f shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0046]** FIG. 21g shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0047]** FIG. 21h shows yet another illustrative display screen for displaying previously viewed content in accordance with the present invention.

**[0048]** FIG. 22 shows an illustrative display screen for allowing a user to enable, disable or modify settings relating to the feature of tracking previously viewed content in accordance with the present invention.

Detailed Description of the Preferred Embodiments

**[0049]** The amount of media available to users in any given media delivery system can be substantial. Consequently, many users desire a form of media guidance, an interface that allows users to efficiently navigate media selections and easily identify media that they may desire. An application which provides such guidance is referred to herein as an interactive media guidance application or, sometimes, a guidance application.

**[0050]** Interactive media guidance applications may take various forms depending on the media for which they provide guidance. One typical type of media guidance application is an interactive television program guide. Interactive television program guides are well-known guidance applications that, among other things, allow users to navigate among and locate television programming viewing choices and, in some systems, digital music choices. The television programming (and music programming) may be provided via traditional broadcast, cable, satellite, Internet, or any other means. The programming may be provided on a subscription basis (sometimes referred to as premium programming), as pay-per-view programs, or on-demand such as in video-on-demand (VOD) systems.

**[0051]** With the advent of the Internet, mobile computing, and high-speed wireless networks, users are able to access media on personal computers (PCs) and devices on which they traditionally could not. Non-television-centric platforms (i.e., platforms that distribute media with equipment not part of the user's broadcast, cable or satellite television-delivery network) allow users to navigate among and locate desirable video clips, full motion videos (which may include television programs), images, music files, and other suitable media. Consequently, media guidance is also necessary on modern non-television-centric platforms. For example, media guidance applications may be provided as on-line applications (i.e., provided on a web-site), or as stand-alone applications or clients on hand-held computers, personal digital assistants (PDAs) or cellular telephones. In some systems, users may control equipment remotely via a media guidance application. For example, users may access an on-line media guide and set recordings or other settings on their in home equipment. This may be accomplished by the on-line guide controlling the user's equipment directly or via another media guide that runs on the user's equipment. Remote access of interactive media guidance applications is discussed in greater detail in U.S. Patent Application No. 11/246,392, filed October 7, 2005, which is hereby incorporated by reference herein in its entirety.

**[0052]** An illustrative interactive media guidance system 100 in accordance with the present invention is shown in FIG. 1. System 100 is intended to illustrate a number of approaches by which media of various types, and guidance for such media, may be provided to (and accessed by) end-users. The present invention, however, may be applied in systems employing any one or a



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subset of these approaches, or in systems employing other approaches for delivering media and providing media guidance.

**[0053]** The first approach represents a typical television-centric system in which users may access television (and in some systems music) programming. This includes programming sources 102 and distribution facility 104. Media such as television programming and digital music is provided from programming sources 102 to distribution facility 104, using communications path 106. Communications path 106 may be a satellite path, a fiber-optic path, a cable path, or any other suitable wired or wireless communications path or combination of such paths.

**[0054]** Programming sources 102 may be any suitable sources of television and music programming, such as television broadcasters (e.g., NBC, ABC, and HBO) or other television or music production studios. Programming sources 102 may provide television programming in a variety of formats in high definition and standard definition, such as, for example, 1080p, 1080i, 720p, 480p, 480i, and any other suitable format.

**[0055]** Distribution facility 104 may be a cable system headend, a satellite television distribution facility, a television broadcaster, or any other suitable facility for distributing video media (e.g., television programs, video-on-demand programs, pay-per-view programs) and audio media (e.g., music programming and music clips) to the equipment of subscribers of the corresponding cable, satellite, or IPTV system. In some approaches, distribution facility 104 may also distribute other media to users, such as video and audio clips, web pages, and interactive applications, that may be offered to subscribers of a given cable, satellite, or IPTV system. There are typically numerous distribution facilities 104 in system 100, but only one is shown in FIG. 1 to avoid overcomplicating the drawing.

**[0056]** Distribution facility 104 may be connected to various user equipment devices 108, 110, and 112. Such user equipment devices may be located, for example, in the homes of users. User equipment devices may include user television equipment 110, user computer equipment 112, or any other type of user equipment suitable for accessing media. User equipment 108 may be any type of user equipment (e.g., user television equipment, user computer equipment, cellular phones, handheld video players, gaming platforms, etc.) and, for simplicity, user equipment devices may be referred to generally as user equipment 108.

**[0057]** User equipment devices 108, 110, and 112 may receive media (such as television, music, web pages, etc.) and other data from distribution facility 104 over communications paths, such as communications paths 114, 116, and 118, respectively. User equipment devices 108, 110, 112 may also transmit signals to distribution facility 104 over paths 114, 116, and 118, respectively. Paths 114, 116, and 118 may be cables or other wired connections, free-space connections (e.g., for broadcast or other wireless signals), satellite links, or any other suitable link or combination of links.

**[0058]** A second approach illustrated in FIG. 1 by which media and media guidance are provided to end users is a non-television-centric approach. In this approach media such as video (which may include television programming), audio, images, web pages, or a suitable combination thereof, are provided to equipment of a plurality of users (e.g., user equipment 108, user television equipment 110, and user computer equipment 112) by server 130 via communications network 126. This approach is non-television-centric because media (e.g., television programming) is provided by and delivered at least partially, and sometimes exclusively, via equipment that have not traditionally been primarily focused on the television viewing experience. Non-television-centric equipment is playing a larger role in the television viewing experience.

**[0059]** In some embodiments for this approach, communications network 126 is the Internet. Server 130 may provide for example, a web site that is accessible to the user's equipment and provides an on-line guidance application for the user. In such approaches, the user's equipment may be, for example, a PC or a hand-held device such as a PDA or web-enabled cellular telephone that incorporates a web browser. In other embodiments, server 130 uses the Internet as a transmission medium but does not use the Web. In such approaches, the user's equipment may run a client application that enables the user to access media. In still other approaches, communications network 126 is a private communications network, such as a cellular phone network, that does not include the Internet.

**[0060]** In yet other approaches, communications network 126 includes a private communications network and the Internet. For example, a cellular telephone or other mobile-device service provider may provide Internet access to its subscribers via a private communications network, or may provide media such as video clips or television programs to its subscribers via the Internet and its own network.

**[0061]** The aforementioned approaches for providing media may, in some embodiments, be combined. For example, a distribution facility 104 may provide a television-centric media delivery system, while also providing users' equipment (e.g., 108, 110 and 112) with access to other non-television-centric delivery systems provided by server 130. For example, a user's equipment may include a web-enabled set-top box or a television enabled PC. Distribution facility 104 may, in addition to television and music programming, provide the user with Internet access whereby the user may access server 130 via communications network 126. Distribution facility 104 may communicate with communications network 126 over any suitable path 134, such as a wired path, a cable path, fiber-optic path, satellite path, or combination of such paths.

**[0062]** Media guidance applications may be provided



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using any approach suitable for the type of media and distribution system for which the applications are used. Media guidance applications may be, for example, stand alone applications implemented on users' equipment. In other embodiments, media guidance applications may be client-server applications where only the client resides on the users' equipment. In still other embodiments, guidance applications may be provided as web sites accessed by a browser implemented on the users' equipment. Whatever the chosen implementation, the guidance application will require information about the media for which it is providing guidance. For example, titles or names of media, brief descriptions, or other information may be necessary to allow users to navigate among and find desired media selections.

**[0063]** In some television-centric embodiments, for example, the guidance application may be a stand-alone interactive television program guide that receives program guide data via a data feed (e.g., a continuous feed, trickle feed, or data in the vertical blanking interval of a channel). Data source 120 in system 100 may include a program listings database that is used to provide the user with television program-related information such as scheduled broadcast times, titles, channels, ratings information (e.g., parental ratings and critic's ratings), detailed title descriptions, genre or category information (e.g., sports, news, movies, etc.), program format (e.g., standard definition, high definition) and information on actors and actresses. Data source 120 may also be used to provide advertisements (e.g., program guide advertisements and advertisements for other interactive television applications), real-time data such as sports scores, stock quotes, news data, and weather data, application data for one or more media guidance applications or other interactive applications, and any other suitable data for use by system 100. As another example, data source 120 may provide data indicating the types of information that may be included in interactive media guidance overlays (e.g., at the request of the user, absent user modification, etc.).

**[0064]** Program guide data may be provided to user equipment, including user equipment located on home network 113, using any suitable approach. For example, program schedule data and other data may be provided to the user equipment on a television channel sideband, in the vertical blanking interval of a television channel, using an in-band digital signal, using an out-of-band digital signal, or by any other suitable data transmission technique. Program schedule data and other data may be provided to user equipment on multiple analog or digital television channels. Program schedule data and other data may be provided to the user equipment with any suitable frequency (e.g., continuously, daily, in response to a request from user equipment, etc.).

**[0065]** In some television-centric embodiments, guidance data from data source 120 may be provided to users' equipment using a client-server approach. For example, a guidance application client residing on the user's equipment may initiate sessions with server 140 to obtain guidance data when needed. In some embodiments, the guidance application may initiate sessions with server 140 via a home network server (e.g., a server located in home network 113 that supports the user equipment devices located in home network 113).

**[0066]** There may be multiple data sources (such as data source 120) in system 100, although only one data source is shown in FIG. 1 to avoid overcomplicating the drawing. For example, a separate data source may be associated with each of a plurality of television broadcasters and may provide data that is specific to those broadcasters (e.g., advertisements for future programming of the broadcasters, logo data for displaying broadcasters' logos in program guide display screens, etc.). Data source 120 and any other system components of FIG. 1 may be provided using equipment at one or more locations. Systems components are drawn as single boxes in FIG. 1 to avoid overcomplicating the drawings.

**[0067]** Data source 120 may provide data to distribution facility 104 over communications path 122 for distribution to the associated user equipment and home network 113 (discussed below) over paths 114, 116, 118, and 119 (e.g., when data source 120 is located at a main facility). Communications path 122 may be any suitable communications path such as a satellite communications path or other wireless path, a fiber-optic or other wired communications path, a path that supports Internet communications, or other suitable path or combination of such paths.

**[0068]** In some television-centric and non-television centric approaches, data source 120 may provide guidance data directly to user equipment 108 over path 124, communications network 126, and path 128 (e.g., when data source 120 is located at a facility such as one of programming sources 102). In some embodiments of the present invention, data source 120 may provide guidance data directly to user equipment located on home network 113 (discussed below) over path'124, communications network 126, and path 139 (e.g., when data source 120 is located at a facility such as one of programming sources 102). Paths 124, 128, and 139 may be wired paths such as telephone lines, cable paths, fiber-optic paths, satellite paths, wireless paths, any other suitable paths or a combination of such paths. Communications network 126 may be any suitable communications network, such as the Internet, the public switched telephone network, or a packet-based network.

**[0069]** User equipment devices, including user equipment devices located on home network 113 (discussed below), such as user television equipment and personal computers, may use the program schedule data and other interactive media guidance application data to display program listings and other information (e.g., information on digital music) for the user. An interactive television program guide application or other suitable interactive media guidance application may be used to display the information on the user's display (e.g., in one or more



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overlays that are displayed on top of video for a given television channel). Interactive displays may be generated and displayed for the user using any suitable approach. In one suitable approach, distribution facility 104, server 130, or another facility, may generate application display screens and may transmit the display screens to user equipment for display. In another suitable approach, user equipment may store data for use in one or more interactive displays (e.g., program schedule data, advertisements, logos, etc.), and an interactive media guidance application implemented at least partially on the user equipment may generate the interactive displays based on instructions received from distribution facility 104, server 130 or another facility. In some embodiments of the present invention, user equipment may store only the data that is used to generate the interactive television displays (e.g., storing logo data for a particular television broadcaster only if the logo is to be included in one or more interactive television displays). In some embodiments of the present invention, user equipment may store data that is not necessarily used to generate the interactive television displays (e.g., storing advertisements associated with a particular television broadcaster that may or may not be displayed depending on, for example, the outcome of negotiations with the television broadcaster). Any other suitable approach or combination of approaches may be used to generate and display interactive overlays for the user.

**[0070]** In still other embodiments, interactive media guidance applications (television-centric and non-television centric) may be provided online as, for example, websites. For example, server 130 may provide an online interactive television program guide. As another example, user equipment 108 may be a mobile device, such as a cellular telephone or personal digital assistant (PDA). The mobile device may be web-enabled to allow the user to access an on-line guidance application (which may be modified from its original version to make it appropriate for a cellular phone). Alternatively, the mobile device may have an applet that communicates with server 130 to obtain guidance data via the Internet.

**[0071]** Server 130 may receive program schedule data and other data from data source 120 via communications path 124, communications network 126, and communications path 132 or via another suitable path or combination of paths. Path 132 may be a satellite path, fiber-optic path, wired path, or any other path or combination of paths. User equipment 108 may access the on-line interactive media guidance application and other sources from server 130 via communications path 128. User equipment 108 may also access the application and other services on server 130 via communications path 114, distribution facility 104, and communications path 134. For example, a cable modem or other suitable equipment may be used by user equipment 108 to communicate with distribution facility 104.

**[0072]** User equipment such as user television equipment 110, user computer equipment 112, and user equipment located on home network 113 may access the on-line interactive media guidance application and server 130 using similar arrangements. User television equipment 110 may access the on-line interactive media guidance application and server 130 using communications path 136 or using path 116, distribution facility 104, and path 134. User computer equipment 112 may access the on-line interactive media guidance application, and server 130 using communications path 138 or using path 118, distribution facility 104, and path 134. User equipment located on home network 113 may access the on-line media guidance application and server 130 using communications path 139 or using path 119, distribution facility 104, and path 134. Paths 136, 138, and 139 may be any suitable paths such as wired paths, cable paths, fiber-optic paths, wireless paths, satellite paths, or a combination of such paths.

**[0073]** In some embodiments, system 100 may support other interactive applications in addition to the interactive media guidance applications. Such applications may be implemented using any suitable approach. For example, the interactive applications may be implemented locally on the user equipment or in a distributed fashion (e.g., using a client-server architecture in which the user equipment serves at least partly, and for at least some of the time, as the client and a server, such as server 140 at distribution facility 104, server 130, or other suitable equipment acts as the server). Other distributed architectures may also be used if desired. Moreover, some or all of the features of the interactive applications of system 100 (including the media guidance application) may be provided using operating system software or middleware software. Such operating system software and middleware may be used instead of or in combination with application-level software. In yet other approaches, interactive applications may also be supported by servers or other suitable equipment at one or more service providers such as service provider 142. Regardless of the particular arrangement used, the software that supports these features may be referred to as an application or applications.

**[0074]** For example, an interactive application such as a home shopping service may be supported by a service provider such as service provider 142 that has sales representatives, order fulfillment facilities, account maintenance facilities, and other equipment for supporting interactive home shopping features. A home shopping application that is implemented using the user equipment may be used to access the service provider to provide such features to the user. The user equipment may access service provider 142 via distribution facility 104 and communications path 144 or via communications network 126 and communications path 146. Communications paths such as paths 144 and 146 may be any suitable paths such as wired paths, cable paths, fiber-optic paths, satellite paths, or a combination of such paths.

**[0075]** Another example of an interactive application is a home banking application. A home banking service



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may be supported using personnel at facilities such as service provider 142. An interactive home banking application that is implemented using the user equipment may access the home banking service via distribution facility 104 and communications path 144 or via communications network 126 and communications path 146.

**[0076]** If desired, an interactive media guidance application such as a network-based video recorder or a video-on-demand application may be supported using server 140, server 130, a home network server, or equipment at service provider 142. Video-on-demand content and video recorded using a network-based video recorder arrangement may be stored on server 140 or server 130 or a home network server or at service provider 142 and may be provided to the user equipment when requested by users. An interactive television program guide, for example, may be used to support the functions of a personal video recorder (sometimes called a digital video recorder) that is implemented using user equipment 108. Illustrative equipment that may be used to support personal video recorder functions include specialized personal video recorder devices, integrated receiver decoders (IRDs), set-top boxes with integrated or external hard drives, or personal computers with video recording capabilities.

**[0077]** Interactive applications such as media guidance applications (e.g., interactive television program guide applications and video-on-demand applications), home shopping applications, home banking applications, game applications, and other applications (e.g., applications related to e-mail and chat or other communications functions, etc.) may be provided as separate applications that are accessed through a navigation shell application (i.e., a menu application with menu options corresponding to the applications). The features of such applications may be combined. For example, games, video-on-demand services, home shopping services, network-based video recorder functions, personal video recorder functions, navigational functions, program guide functions, communications functions, and other suitable functions may be provided using one application or any other suitable number of applications. The one or more applications may display various overlays on user equipment including, for example, interactive television information on top of video for a given television channel.

**[0078]** Interactive television program guide applications, home banking applications, home shopping applications, network-based video recorder and personal video recorder applications, video-on-demand applications, gaming applications, communications applications, and navigational applications are only a few illustrative examples of the types of interactive media guidance and other applications that may be supported by system 100. Other suitable interactive applications that may be supported include news services, web browsing and other Internet services, and interactive wagering services (e.g., for wagering on horse races, sporting events, and the like). Interactive television overlays that are displayed by these applications may also be customized in accordance with the present invention.

**[0079]** Users may have multiple types of user equipment by which they access media and obtain media guidance. For example, some users may have home networks that are accessed by in-home and mobile devices. As shown in FIG. 1, home network 113 communicates with distribution facility 104 and server 130 over paths 119 and 139 (and, in the case of server 130, communications network 126). Such home networks 113 may be located, for example, in homes of users or distributed, for example, among homes of users. Home networks 113 may each include a plurality of interconnected user equipment devices, such as, for example user equipment devices 108, 110 and 112. In some embodiments, users may control in-home devices via a media guidance application implemented on a remote device. For example, users may access an online media guidance application on a website via a personal computer at their office, or a mobile device such as a PDA or web-enabled cellular telephone. The user may set settings (e.g., recordings, reminders, or other settings) on the on-line guidance application to control the user's in-home equipment. The on-line guide may control the user's equipment directly, or by communicating with a media guidance application on the user's in-home equipment.

**[0080]** FIGS. 2-6 show illustrative arrangements for user equipment. An illustrative set-top box-based arrangement for user equipment 110 is shown in FIG. 2. User television equipment 110 may be stand-alone or a part of home network 113 (FIG. 1). Input/output 202 may be connected to communications paths such as paths 116 and 136 (FIG. 1). Input/output functions may be provided by one or more wires or communications paths, but are shown as a single path in FIG. 2 to avoid overcomplicating the drawing. Television programming, program guide data, and any other suitable interactive media guidance application data or other data may be received using input/output 202. Commands and requests and other data generated as a result of user interactions with the interactive media guidance application may also be transmitted over input/output 202.

**[0081]** Set-top box 204 may be any suitable analog or digital set-top box (e.g., a cable set-top box). Set-top box 204 may contain an analog tuner for tuning to a desired analog television channel (e.g., a channel comprising television programming, interactive television data, or both). Set-top box 204 may also contain digital decoding circuitry for receiving digital television channels (e.g., channels comprising television or music programming, interactive television data, etc.). Set-top box 204 may also contain a high-definition television tuner for receiving and processing high-definition television channels. Analog, digital, and high-definition channels may be handled together if desired. Multiple tuners may be provided (e.g., to handle simultaneous watch and record functions or picture-in-picture (PIP) functions). Box 204 may be an integrated receiver decoder (IRD) that handles satellite



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television. If desired, box 204 may have circuitry for handling cable, over-the-air broadcast, and satellite content.

**[0082]** Set-top box 204 may be configured to output media, such as television programs, in a preferred format. Because television programs may be received in a variety of formats, set-top box 204 may contain scaler circuitry for upconverting and downconverting television programs into the preferred output format used by set-top box 204. For example, set-top box 204 may be configured to output television programs in 720p. In this example, the scaler circuitry may upconvert standard-definition television programs having 480 lines of vertical resolution to 720p format and downconvert certain high-definition television programs having 1080 lines of vertical resolution to 720p format.

**[0083]** Box 204 may include a storage device (e.g., a digital storage device such as a hard disk drive) for providing recording capabilities. Box 204 may also be connected to a recording device 206 such as a video cassette recorder, personal video recorder, optical disc recorder, or other device or devices with storage capabilities. In some embodiments, box 204 may be configured to record either standard-definition television programs or high-definition television programs. In some embodiments, box 204 may be configured to record both standard-definition television programs and high-definition television programs.

**[0084]** Set-top box 204 contains a processor (e.g., a microcontroller or microprocessor or the like) that is used to execute software applications. Set-top box 204 may contain memory such as random-access memory for use when executing applications. Nonvolatile memory may also be used (e.g., to launch a boot-up routine and other instructions). Hard disk storage in box 204 or in recording device 206 may be used to back up data and to otherwise support larger databases and storage requirements than may be supported using random-access memory approaches. Hard disk storage in box 204 or in recording device 206 may also be used to store and back up program guide settings or saved user preferences.

**[0085]** Set-top box 204 may have infrared (IR) or other communications circuitry for communicating with a remote control or wireless keyboard. Set-top box 204 may also have dedicated buttons and a front-panel display. The front-panel display may, for example, be used to display the current channel to which the set-top box is tuned.

**[0086]** Set-top box 204 may also have communications circuitry such as a cable modem, an integrated services digital network (ISDN) modem, a digital subscriber line (DSL) modem, a telephone modem, or a wireless modem for communications with other equipment. Such communications may involve the Internet or any other suitable communications networks or paths. If desired, the components of set-top box 204 may be integrated into other user equipment (e.g., a television or video recorder).

**[0087]** Recording device 206 may be used to record videos provided by set-top box 204. For example, if set-top box 204 is tuned to a given television channel, the video signal for that television channel may be passed to recording device 206 for recording on a videocassette, compact disc, digital video disk, or internal hard drive or other storage device. In some embodiments, recording device 206 may be configured to record either standard-definition television programs or high-definition television programs. In some embodiments, recording device 206 may be configured to record both standard-definition television programs and high-definition television programs. Recording device 206 may have communications circuitry such as a cable modem, an ISDN modem, a DSL modem, or a telephone modem for communications with other equipment. Such communications may involve the Internet or any other suitable communications networks or paths. The components of recording device 206 may be integrated into other user equipment (e.g., a television, stereo equipment, etc.).

**[0088]** Recording device 206 may be controlled using a remote control or other suitable user interface. If desired, video recorder functions such as start, stop, record and other functions for device 206 may be controlled by set-top box 204. For example, set-top box 204 may control recording device 206 using infrared commands directed toward the remote control inputs of recording device 206 or set-top box 204 may control recording device 206 using other wired or wireless communications paths between box 204 and device 206.

**[0089]** The output of recording device 206 may be provided to television 208 for display to the user. In some embodiments, television 208 may be capable of displaying high-definition programming (i.e., HDTV-capable). If desired, multiple recording devices 206 or no recording device 206 may be used. If recording device 206 is not present or is not being actively used, the video signals from set-top box 204 may be provided directly to television 208. Any suitable television or monitor may be used to display the video. For example, if the video is in a high-definition format, an HDTV-capable television or monitor is required to display the video. In the equipment of FIG. 2 and the other equipment of system 100 (FIG. 1), the audio associated with various video items is typically distributed with those video items and is generally played back to the user as the videos are played. In some embodiments, the audio may be distributed to a receiver (not shown), which processes and outputs the audio via external speakers (not shown).

**[0090]** Another illustrative arrangement for user television equipment 110 (FIG. 1) is shown in FIG. 3. User television equipment 110 may be stand-alone or a part of home network 113 (FIG. 1). In the example of FIG. 3, user television equipment 110 includes a recording device 302 such as a digital video recorder (e.g., a personal video recorder (PVR)) that uses a hard disk or other storage for recording video. Recording device 302 may alternatively be a digital video disc recorder, compact disc recorder, videocassette recorder, or other suitable re-



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cording device. Equipment 110 of FIG. 3 may also include a television 304. In some embodiments, television 304 may be HDTV-capable. Input/output 306 may be connected to communications paths such as paths 116 and 136 (FIG. 1). Television programming, program schedule data, and other data (e.g., advertisement data, data indicating one or more television channels for which the display of an overlay is to be customized, etc.) may be received using input/output 306. Commands and requests and other data from the user may be transmitted over input/output 306.

**[0091]** Recording device 302 may contain at least one analog tuner for tuning to a desired analog television channel (e.g., to display video for a given television channel to a user, to receive program guide data and other data) and multiple other tuners may also be provided. Recording device 302 may also contain digital decoding circuitry for receiving digital television programming, music programming, program guide data, and other data on one or more digital channels. Recording device 302 may also contain circuitry for receiving high-definition television channels. If desired, recording device 302 may contain circuitry for handling analog, digital, and high-definition channels. Recording device 302 also contains a processor (e.g., a microcontroller or microprocessor or the like) that is used to execute software applications. Recording device 302 may contain memory such as random-access memory for use when executing applications. Nonvolatile memory may also be used to store a boot-up routine or other instructions. The hard disk and other storage in recording device 302 may be used to support databases (e.g., program guide databases or other interactive television application databases). The hard disk or other storage in recording device 302 may also be used to record video such as television programs or video-on-demand content or other content provided to recording device 302 over input/output 306.

**[0092]** Recording device 302 may have IR communications circuitry or other suitable communications circuitry for communicating with a remote control. Recording device 302 may also have dedicated buttons and a front-panel display. The front-panel display may, for example, be used to display the current channel to which the recording device is tuned.

**[0093]** Recording device 302 may also have communications circuitry such as a cable modem, an ISDN modem, a DSL modem, a telephone modem, or a wireless modem for communications with other equipment. Such communications may involve the Internet or other suitable communications networks or paths.

**[0094]** If desired, recording device 302 may include a satellite receiver or other equipment that has wireless communications circuitry for receiving satellite signals.

**[0095]** Recording device 302 of FIG. 3 or recording device 206 of FIG. 2 may record new video while previously recorded video is being played back on television 304 or 208. This allows users to press a pause button during normal television viewing. When the pause button is pressed, the current television program is stored on the hard disk of digital video recorder 302. When the user presses play, the recorded video may be played back. This arrangement allows the user to seamlessly pause and resume television viewing. Recording devices 302 and 206 may also be used to allow a user to watch a previously-recorded program while simultaneously recording a new program.

**[0096]** The set-top box arrangement of FIG. 2 and the personal video recorder with a built-in set-top box arrangement of FIG. 3 are merely illustrative. Other arrangements may be used if desired. For example, user television equipment may be based on a WebTV box, a personal computer television (PC/TV), or any other suitable television equipment arrangement. If desired, the functions of components such as set-top box 204, recording device 302, a WebTV box, or PC/TV or the like may be integrated into a television or personal computer or other suitable device.

**[0097]** An illustrative remote control 400 for operating user television equipment 110 (FIG. 1) or suitable user computer equipment 112 is shown in FIG. 4. Remote control 400 is only illustrative and any other suitable user input interface may be used to operate user equipment (e.g., a mouse, trackball, keypad, keyboard, touch screen, voice recognition system, etc.). Remote control 400 may have function keys 402 and other keys 404 such as keypad keys, power on/off keys, pause, stop, fast-forward and reverse keys. Volume up and down keys 406 may be used for adjusting the volume of the audio portion of a video. Channel up and down keys 408 may be used to change television channels and to access content on virtual channels. Cursor keys 410 may be used to navigate on-screen menus. For example, cursor keys 410 may be used to position an on-screen cursor, indicator, or highlight (sometimes all generically referred to herein as a highlight or highlight region) to indicate interest in a particular option or other item on a display screen that is displayed by the interactive television application.

**[0098]** OK key 412 (sometimes called a select or enter key) may be used to select on-screen options that the user has highlighted.

**[0099]** Keys 402 may include RECORD key 414 for initiating recordings. MENU button 416 may be used to direct an interactive media guidance application to display a menu on the user's display screen (e.g., on television 208 or 304 or on a suitable monitor or computer display). INFO button 418 may be used to direct an interactive media guidance application to display an information display screen. For example, when a user presses INFO key 418 while video for a given television channel is displayed for the user, an interactive television program guide may display a FLIP/BROWSE overlay including program schedule information for the current program on the given television channel on top of the video. As another example, when a particular program listing in an interactive television program listings display screen is



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highlighted, the user pressing INFO button 418 may cause an interactive television program guide to provide additional program information associated with that program listing (e.g., a program description, actor information, schedule information, etc.).

**[0100]** LOCK button 420 may be used to modify access privileges. For example, a parent may use LOCK button 420 or on-screen options to establish parental control settings for the interactive media guidance application. The parental control settings may be time-based settings (e.g., to prevent a child from watching television during a particular time block, such as from 3:00 PM to 5:00 PM). The parental control settings may also be used to, for example, block programming based on rating, channel, and program title. A locked or blocked program (or other media) is typically not viewable until the interactive media guidance application is provided with a suitable personal identification number (PIN). Once this PIN has been entered, the interactive media guidance application will unlock the user's equipment and allow the locked content to be accessed.

**[0101]** EXIT button 422 may be used to exit the interactive media guidance application or to exit a portion of the interactive media guidance application (e.g., to cause an interactive television program guide to remove a FLIP, BROWSE, or other interactive television overlay from the display screen). GUIDE button 424 may be used to invoke an interactive television program guide (e.g., a program guide menu screen, program listings screen, or other program guide screen).

**[0102]** The keys shown in FIG. 4 are merely illustrative. Other keys or buttons may be provided if desired. For example, a music button may be used to access music with the interactive media guidance application. An edit button may be used to edit stored content (e.g., to remove commercials, remove portions of a video, etc.). Alphanumeric buttons may be used to enter alphanumeric characters. A last or back button may be used to browse backward in the interactive media guidance application (e.g., to return to a previous channel, web page, or other display screen). Video recorder function buttons such as a play button, pause button, stop button, rewind button, fast-forward button, and record button, may be used to control video recorder functions (local or network-based) in system 100 (FIG. 1). A help key may be used to invoke help functions such as context-sensitive on-screen help functions.

**[0103]** Illustrative user computer equipment 112 (FIG. 1) is shown in FIG. 5. User computer equipment 112 may be stand-alone or a part of home network 113 (FIG. 1). In the arrangement of FIG. 5, personal computer unit 502 may be controlled by the user using keyboard 504 and/or other suitable user input device such as a trackball, mouse, touch pad, touch screen, voice recognition system, or a remote control, such as remote control 400 of FIG. 4. Video content, such as television programming or web pages having video elements, and interactive media guidance application display screens may be displayed on monitor 506. Television and music programming, media guidance application data (e.g., television program guide data), video-on-demand content, video recordings played back from a network-based video recorder, and other data may be received from paths 118 and 138 (FIG. 1) using input/output 508. User commands and other information generated as a result of user interactions with the interactive media guidance application and system 100 (FIG. 1) may also be transmitted over input/output 508.

**[0104]** Personal computer unit 502 may contain a television or video card, such as a television tuner card, for decoding analog, digital, and high-definition television channels and for handling streaming video content. Multiple video cards (e.g., tuner cards) may be provided if desired. An illustrative television tuner card that may be used may contain an analog television tuner for tuning to a given analog channel, digital decoding circuitry for filtering out a desired digital television or music channel from a packetized digital data stream, and a high-definition television tuner for tuning to a high-definition channel. Any suitable card or components in computer unit 502 may be used to handle video and other content delivered via input/output line 508 if desired.

**[0105]** Personal computer unit 502 may contain one or more processors (e.g., microprocessors) that are used to run the interactive media guidance application or a portion of the interactive media guidance application.

**[0106]** Personal computer unit 502 may include a hard drive, a recordable DVD drive, a recordable CD drive, or other suitable storage device or devices that stores video, program guide data, and other content. The interactive media guidance application and personal computer unit 502 may use a storage device or devices to, for example, provide the functions of a personal video recorder.

**[0107]** User equipment, such as user equipment 108, user television equipment 110, user computer equipment 112, and user equipment located on home network 113 (FIG. 1), may be used with network equipment such as server 130, server 140, a home network server, and equipment at service providers such as service provider 142 of FIG. 1 to provide network-based video recording functions. Video recording functions may be provided by storing copies of television programs and other video content on a remote server (e.g., server 130 or server 140 or a home network server) or other network-based equipment, such as equipment at a service provider such as service provider 142.

**[0108]** Video recordings may be made in response to user commands that are entered at user equipment 108 or user equipment located on home network 113 (FIG. 1). In a personal video recorder arrangement, the interactive media guidance application may be used to record video locally on the user equipment in response to the user commands. In a network-based video recorder arrangement, the interactive media guidance application may be used to record video or to make virtual recordings (described below) on network equipment such as server



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130, server 140, a home network server, or equipment at service provider 142 in response to the user commands. The user commands may be provided to the network equipment over the communications paths shown in FIG. 1. The personal video recorder arrangement and the network-based video recorder arrangement can support functions.such as fast-forward, rewind, pause, play, and record.

**[0109]** To avoid unnecessary duplication in a network-based video recorder environment, system 100 may provide network-based video recording capabilities by using virtual copies or recordings. With this approach, each user may be provided with a personal area on the network that contains a list of that user's recordings. The video content need only be stored once (or a relatively small number of times) on the network equipment, even though a large number of users may have that video content listed as one of their recordings in their network-based video recorder personal area. Personal settings or any other suitable data may be stored in a user's personal area on the network.

**[0110]** The user television equipment and user computer equipment arrangements described above are merely illustrative. A more generalized embodiment of illustrative user equipment 108, 110, and 112 (FIG. 1) and user equipment located on home network 113 (FIG. 1) is shown in FIG. 6. Control circuitry 602 is connected to input/output 604. Input/output 604 may be connected to one or more communications paths such as paths 114, 116, 118, 128, 136, and 138 of FIG. 1. Media (e.g., television programming, music programming, other video and audio, and web pages) may be received via input/output 604 (e.g., from programming sources 102, servers or other equipment, such as server 130, service providers such as service provider 142, distribution facility 104, etc.). Interactive media guidance application data, such as program schedule information for an interactive television program guide, may be received from data source 120 via input/output 604. Input/output 604 may also be used to receive data from data source 120 for other interactive television applications. The user may use control circuitry 602 to send and receive commands, requests, and other suitable data using input/output 604.

**[0111]** Control circuitry 602 may be based on any suitable processing circuitry 606 such as processing circuitry based on one or more microprocessors, microcontrollers, digital signal processors, programmable logic devices, etc. In some embodiments, control circuitry 602 executes instructions for an interactive media guidance application or other interactive application (e.g., web browser) from memory. Memory (e.g., random-access memory and read-only memory), hard drives, optical drives, or any other suitable memory or storage devices may be provided as storage 608 that is part of control circuitry 602. Tuning circuitry such as one or more analog tuners, one or more MPEG-2 decoders or other digital video circuitry, high-definition tuners, or any other suitable tuning or video circuits or combinations of such circuits may also be included as part of circuitry 602. Encoding circuitry (e.g., for converting over-the-air, analog, or digital signals to MPEG signals for storage) may also be provided. The tuning and encoding circuitry may be used by the user equipment to receive and display, play, or record a particular television or music channel or other desired audio and video content (e.g., video-on-demand content or requested network-based or local video recorder playback). Television programming and other video and on-screen options and information may be displayed on display 610. Display 610 may be a monitor, a television, or any other suitable equipment for displaying visual images. In some embodiments, display 610 may be HDTV-capable. Speakers 612 may be provided as part of a television or may be stand-alone units. Digital music and the audio component of videos displayed on display 610 may be played through speakers 612. In some embodiments, the audio may be distributed to a receiver (not shown), which processes and outputs the audio via speakers 612.

**[0112]** A user may control the control circuitry 602 using user input interface 614. User input interface 614 may be any suitable user interface, such as a mouse, trackball, keypad, keyboard, touch screen, touch pad, voice recognition interface, or a remote control.

**[0113]** Peripheral device 618 may also be connected to processing circuitry 606 over communications path 616. Peripheral devices may include cellular phones, personal data assistants, handheld media players, and any other suitable peripheral device. Communications path 616 may include for example, USB cables, IEEE 1394 cables, or wireless paths (e.g., Bluetooth, infrared). Processing circuitry 606 may provide content and data to peripheral device 618.

**[0114]** In some embodiments, user equipment device 108, 110, and 112 may comprise a peripheral device connected to a docking station. The display, speakers, user input interface, processing circuitry, and storage may be provided by the peripheral device. The docking station may allow the peripheral device to connect to input/output 604.

**[0115]** Processing circuitry 606 of user equipment device 108, 110, and 112 may further be coupled to identification system 620. Identification system 616 may be any suitable device for identifying a user in viewing vicinity of, or interacting with, a user equipment device. Such an identification system may increase or enhance a user's media viewing experience because there may be no need for the user to manually indicate the identity of the person viewing or interacting with the user device. Moreover, the identification system may enhance the user's ability to maintain or update personal user profiles (e.g., viewer history). An example of an identification system 616 may include a fingerprinting system, which may scan in a user a scanner (e.g., located on a remote control). Another example identification system 616 may include a retina scanner that is able to determine the identity of a user based on his or her retina. Yet another example



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of identification system 620 is a thermal imaging system that is able to identify a person based on his or her thermal profile. A further example of identification system 620 may include a motion sensor/camera system that takes a picture when a user trips the motion sensor. The picture may be cross-referenced with predetermined data (e.g., height and width) to ascertain the identity of the person or persons in the picture.

**[0116]** FIGS. 7, 8a, 8b, 8c, 9, and 10 show various illustrative home networks 113. The user equipment devices located on home network 113 may be able to share program data (such as program listings and program information), recorded content, program guide settings, and any other suitable data with other user equipment devices located on home network 113. Interactive television applications implemented on or accessible from user equipment devices located on home network 113 may be able to adjust program guide settings for interactive television applications implemented on or accessible from other user equipment devices located on home network 113.

**[0117]** FIG. 7 shows an illustrative home network 113 in accordance with the present invention. Home network 113 may include primary user equipment 702 and secondary user equipment 704, 706, and 708. Primary user equipment 702 may be connected to secondary user equipment 704, secondary user equipment 706, and secondary user equipment 708 via communication paths 710. Primary and secondary user equipment may each be any of user equipment 108, 110, and 112 (FIG. 1). Communications paths 710 may be any suitable communications path for in-home networks, such as wired paths, cable paths, fiber-optic paths, wireless paths, or a combination of such paths. Communications paths 119 and 139 may connect home network 113 to television distribution facility 104 (FIG. 1) and communications network 126 (FIG. 1), respectively, via primary user equipment 702. As shown, one or more pieces of secondary user equipment may be connected to primary user equipment 702 in a star configuration, if desired. User equipment devices may be located in different rooms within a home. For example, primary user equipment 702 may be placed in the parents' bedroom, secondary user equipment 708 may be placed in the children's room, secondary user equipment 704 may be placed in a living room, and secondary user equipment 706 may be placed in a guest room. With such an arrangement, the parents' bedroom may be used as a master location to adjust user settings for the program guides on the user equipment in the children's room and the other rooms.

**[0118]** FIG. 8a is a diagram of an illustrative home network 113 in which a plurality of user equipment are implemented in a tree configuration in accordance with the present invention. Home network 113 may include user equipment 802, 804, 806, and 808, which are connected to each of the others via communications paths 810. User equipment 802, 804, 806, and 808 may each be any of user equipment 108, 110, and 112 (FIG. 1). It should be understood by one skilled in the art that not all of user equipment 802, 804, 806, and 808 may include recording devices (e.g., recording device 206 (FIG. 2) and recording device 302 (FIG. 3)). Communications paths 810 may be any suitable communications path for in-home networks, such as wired paths, cable paths, fiber-optic paths, wireless paths, or a combination of such paths. Two or more pieces of user equipment may be connected in this way. Communications paths 119 and 139 may connect home network 113 to television distribution facility 104 (FIG. 1) and communications network 126 (FIG. 1), respectively, via user equipment 808. Although, as illustrated, communications paths 119 and 139 are connected to user equipment 808, it could be connected to any one or more of user equipment 802, 804, 806, or 808. The equipment mentioned above may be placed in various rooms within a home. For example, user equipment 802 may be placed in a parents' bedroom, user equipment 804 may be placed in a children's room, user equipment 806 may be placed in a living room, and user equipment 808 may be placed in a guest room. With the arrangement of FIG. 8a, each piece of user equipment on home network 113 may communicate with each other piece of user equipment on home network 113 over communications paths 810.

**[0119]** Peripheral device 814 may be connected to user equipment device 808, which may provide peripheral device 814 with content and data. It should be understood by one skilled in the art that one or more peripheral devices 814 may be connected to any user equipment device regardless of the configuration of the home network. In some cases, peripheral devices may act as user equipment devices in a home network. For example, the role of user equipment 804 may be limited to receiving data and content from user equipment 808. This role may be filled by a peripheral device (e.g., a handheld media player) that is configured to communicate with user equipment 808 over communications path 810.

**[0120]** FIG. 8a shows home network 113 connected in a tree topology. If desired, this level of interconnectivity may be achieved using communications paths that are arranged in a ring configuration (FIG. 8b), bus configuration (FIG. 8c) or other suitable topology. Any of these topologies may use the types of communications paths described in connection with the arrangement of home network 113 shown in FIG. 8a. Home network 113 that is arranged in a bus topology may include bus 812 to interconnect the pieces of user equipment on home network 113 and communications paths 119 and 139.

**[0121]** FIG. 9 shows an illustrative home network 113 based on a client-server architecture. Home network 113 may include server 902 and user equipment 904, 906, and 908. Server 902 may be connected to user equipment 904, 906, and 908 via communication paths 910. In some embodiments, server 902 may be embedded within one of the user equipment devices. Communications paths 119 and 139 may connect home network 113 to television distribution facility 104 (FIG. 1) and commu-



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nications network 126 (FIG. 1), respectively, via server 902. User equipment 904, 906, and 908 may each be any of user equipment 108, 110, and 112 (FIG. 1). User equipment 904, 906, and 908 and server 902 may be placed in various rooms within a home. For example, server 902 may be placed in a den, user equipment 904 may be placed in a children's room, user equipment 906 may be placed in a living room, user equipment 908 may be placed in a parents' room. Communication paths 910 may be any suitable communications path for in-home networks, such as wired paths, cable paths, fiber-optic paths, wireless paths, or a combination of such paths.

**[0122]** As in the examples of FIGS. 8a, 8b, and 8c, different communications path arrangements such as buses, rings and the like, may be used to interconnect a server and user equipment on home network 113 based on a client-server architecture.

**[0123]** FIG. 10 shows an illustrative configuration of home network 113 based on a single set-top box. Home network 113 may include set-top box 1002, optional recording device 1004, and televisions 1006, 1008, 1010, and 1012. Set-top box 1002 may be similar to set-top box 204 (FIG. 2) Recording device 1004 may be similar to recording device 206 (FIG. 2). Televisions 1006, 1008, 1010, and 1012 may be similar to television 208 (FIG. 2). Set-top box 1002 may be connected to recording device 1004 and televisions 1008, 1010, and 1012 via communication paths 1014. Recording device 1004 may be connected to television 1006. Set-top box 1002 and recording device 1004 may be within a single box. If desired, any combination of televisions with or without recording devices may be connected in a similar manner. The set-top box, recording device and televisions of FIG. 10 may be placed in different rooms within a home. For example, set top box 1002, recording device 1004 and television 1006 may be placed in a parent's bedroom, television 1008 may be placed in a children's room, and television 1010 may be placed in a living room, and television 1012 may be placed in a guest room. Communication paths 1014 may be any suitable communications path for in-home networks, such as wired paths, cable paths, fiber-optic paths, wireless paths, satellite paths, or a combination of such paths. Communications paths 119 and 139 may connect home network 113 to television distribution facility 104 (FIG. 1) and communications network 126 (FIG. 1), respectively, via set top box 1002.

**[0124]** FIGS. 11a, 11b, 11c, and 11d show illustrative configurations of connections between home networks and television distribution facility 104 (FIG. 1). Only one user equipment device is shown on the home networks in FIGS. 11b, 11c, and 11d to avoid over-complicating the drawings. However, the home networks shown in FIGS. 11a, 11b, 11c, and 11d may contain multiple pieces of user equipment configured as shown in FIGS. 7, 8a, 8b, 8c, 9, or 10.

**[0125]** FIG. 11a shows an illustrative configuration in which multiple homes are connected to a common server. Server 140 (FIG. 1) may be located at television distribution facility 104 (FIG. 1). Television distribution facility 104 may be at or may be one of private home, a commercial building, a network node, or other suitable structure that may be connected to a plurality of homes. In the example of FIG. 11a, server 140 is connected to user equipment 1110, 1112, 1114, and 1116 that is located in homes 1104, 1102, 1106, and 1108, respectively via communication paths 114 (FIG. 1). When multiple user equipment devices exist within a home, such as home 1109, as shown by devices 1118a and 1118b, each user equipment device may communicate with the server 140 independently via communication paths 119 (FIG. 1). Alternatively, only one device may communicate with server 140 while the other device communicates via a home network. In other words, in separate arrangements, there are any of 1) multiple connections to server 140 and each user equipment device communicates with server 140 independently with no need for an in-home network, 2) only one connection to server 140 and each user equipment device communicates with each other through an in-home network, or 3) each user equipment device communicates with server 140 and with each other through an in-home network.

**[0126]** As shown in FIG. 11b, the capabilities of server 140 (FIG. 1) may be provided using servers 1122 located at network nodes 1120. Servers, such as servers 1122, may be used instead of server 140 or may be used in conjunction with a server 140 located at television distribution facility 104 (FIG. 1). Servers 1122 may be connected to one or more user equipment 108 (FIG. 1). Servers 1122 may also be connected to one or more home networks, such as, for example home network 113 (FIG. 1).

**[0127]** As shown in FIG. 11c, user equipment in different homes may be connected by communications links. For example, user equipment 1136 may be connected to user equipment 1138 via link 1140.

Link 1140 may be a wired or wireless link. In this manner, home 1132 and home 1134 may share program guide settings and recorded content. Home networks located in different homes may also be interconnected in this manner. In some embodiments, a group of homes (i.e., more than two homes) may also be connected to share program guide settings and recorded content. A tree, ring, or bus configuration may be used to connect the group of homes.

**[0128]** As shown in FIG. 11d, user equipment in different homes may be connected via an outside server. For example, user equipment 1156 may be connected to user equipment 1158 via server 1150. Communication paths 1160 may be a wired or wireless path. In this manner, home 1152 and home 1154 may share program guide settings and recorded content. Home networks located in different homes may also be interconnected in this manner. In some embodiments, a group of homes (i.e., more than two homes) may also be connected to server 1150 to share program guide settings and recorded content. A tree, ring, or bus configuration may be used to



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connect the group of homes and server 1150.

**[0129]** In a home network, a user may wish to record television programming from any given user equipment device and view the recorded programming from another user equipment device located on the home network. For example, the user may access an interactive media guidance application implemented on user equipment located in the living room to record "American Idol". After the recording is completed, the user may access an interactive media guidance application implemented on user equipment located, for example, in the bedroom to access and view the recording of "American Idol".

**[0130]** However, the display and recording capabilities of the user equipment devices may differ. As a result, some user equipment devices in the home network may not be able to display content recorded by other user equipment devices in the home network. For example, a cellular phone and a high-definition digital video recorder may be part of two separate user equipment devices in a home network. The cellular phone cannot display recordings having a resolution greater than 160 x 100 pixels. Therefore, the cellular phone cannot display, for example, a recording of a high-definition television program on the digital video recorder. In addition, the cellular phone may also lack the bandwidth to download the high-definition recording in a reasonable amount of time.

**[0131]** In addition to supporting different resolutions and having different bandwidths, other capabilities that may differ among user equipment devices in a home network may include, for example, the types of media supported by the user equipment devices, the processing power of the user equipment devices, the ability of the user equipment devices to decode various video and audio formats, and any other suitable capabilities.

**[0132]** The present invention provides systems and methods for providing content, for example, interactive content or media content, for use in one or more home networks. Some of the interactive content may be provided in a "New to Me" context, which may identify content that has been previously viewed or recorded, or which may present information or otherwise perform an action based on identifying previously viewed content, in a flexible manner that optimizes a user's program guide and viewing experience. It may be especially important to keep track of and manage previously viewed content in a home network environment, where users typically interact with multiple different user devices in the home network on a regular basis. Management of content may be performed at different levels of specificity. In one embodiment of the invention, content may be managed at an individual level or at a device level within a particular home network. In another embodiment of the invention, content may be managed at the household level, or across multiple home networks. In yet another embodiment of the invention, content may be managed across multiple home networks, but with respect to an individual or a user device. Each of these aspects are discussed in further detail below, but in order to facilitate an understanding of the various embodiments, several terms, all of which are applicable to various embodiments of the present invention, are discussed first. A few of these terms include viewing history, interactive content, and media content.

**[0133]** The viewing history may represent a history of viewed, played, or displayed content. More particularly, viewing history, as defined herein includes, but is not limited to, a compilation of content that has been displayed, viewed, or played on at least one user device that is communicatively coupled to a home network. In other words, the viewing history is akin to logbook or profile that keeps track of content that has been viewed, played, recorded, or any combination thereof for a particular individual, device, or home network. Thus, a viewing history may be provided for individuals, user devices, and home networks.

**[0134]** The viewing history may provide a framework or guidelines that enables the interactive media guidance application to manage content. For example, if content is managed at the individual level, a viewing history may be specifically maintained for each individual that interacts with a device communicatively coupled to a home network. When a particular user accesses various user devices communicatively coupled to the home network, the interactive media guidance application may access the viewing history for that particular user to determine the content to be provided to the user device being used by that user. As another example, a viewing history may be maintained for a selected device that is communicatively coupled to a home network. In yet another example, a viewing history may be maintained for one or more home networks, or for an individual or device that is maintained across two or more home networks.

**[0135]** FIG. 12 shows several different types of content (also referred to as media content) that may be monitored for creating, modifying, or updating a viewing history in accordance with the principles of the present invention. As shown, FIG. 12 includes television programming 1202, music programming 1204, advertisements 1206, interactive media guide application content 1208, additional information 1210, and recorded programming 1212. Television programming 1202 may include content such as broadcast programming, recorded programming, pay-per-view programming, video-on-demand programming, near video-on-demand programming, streaming media programming, Internet accessible programming (e.g., programming that may be downloaded from the Internet or a website), or any other suitable television programming. Music programming 1204 may include music programming such as satellite radio, Internet radio, stored music files (e.g., .mp3 or .wav files), or any other music programming. Advertisements 1206 may include advertisements that are displayed as part of television programming viewed by a user (e.g., displayed at the beginning, middle, and/or end of the programming) or by interactive media guide applications in, for example, an overlay, a flip or browse overlay, a full screen overlay,



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a partial screen overlay, in an advertisement window or region, or as a banner advertisement, a targeted advertisement, a channel advertisement, a pop-up advertisement, an interactive advertisement, or any other suitable advertisement. Interactive media guidance application content 1208 may include, for example, a listing of programming, media guide display screens, a listing of recorded programming, or any other suitable interactive media guide content. Additional information 1210 may include, for example, any information from the Internet not previously described, or information stored in databases or servers accessible by the interactive media guidance system. Recorded programming 1212 includes any type of programming that has been recorded on physical media. It is understood that the various types of content shown in FIG. 12, and the discussion accompanying each type of content, that may be monitored for creating or updating a viewing history is not exhaustive, and that other types of content (e.g., media) not specifically discussed herein, or has yet to be developed, may be monitored.

**[0136]** FIG. 13 shows several monitors that may be used to track various aspects of the viewed or played content. Content viewed monitor 1302 may monitor which content (e.g., any of the content discussed above in connection with FIG. 12) has been viewed. For example, if the first season, fourth episode, of "Family Guy" is viewed, viewed content monitor 1302 may update the viewing history to reflect the fact that this particular episode of "Family Guy" has been viewed. If a particular advertisement is displayed, for example, by the interactive media guidance application, viewed content monitor 1302 may update a viewing history to reflect the fact that this particular advertisement has be displayed. Viewed content monitor 1302 may designate content as being viewed when at least a predetermined portion of the content has been viewed. For example, if a majority of the content (e.g., at least half of the length of the content) has been viewed, the content may be marked as having been viewed. Note that the predetermined viewing portion may vary depending on the type of content being viewed. For example, a user that begins playing a video-on-demand program, but stops play five minutes into the program (because he or she did not like the program) may result in monitor 1302 deeming this program as having been viewed. If desired a timestamp, indicating a date or time the content was last viewed may be stored in the viewing history.

**[0137]** Frequency monitor 1304 may monitor the number of times particular content has been viewed. For example, the number of times a television program or advertisement is viewed may be stored in the viewing history. In other approaches, frequency monitor 1304 may monitor the number of times a user requests or views, for example, previews or supplemental information such as information blurbs on various programming may be recorded in a viewer history.

**[0138]** Bookmark monitor 1306 may keep track of the program (e.g., television program) being viewed or a location in a program (e.g., a video-on-demand or a recorded program) being viewed when the user paused or stopped play. The following example illustrates a use of bookmarked information. Assume that a user is watching a recorded program on user equipment located in a first room, but stops play of the recorded program. The point at which the recorded program is stopped may be bookmarked. Further, assume that the user interacts with user equipment in the second room. The bookmark may enable the user equipment in the second room to resume play of the recorded program at point at which the user stop playback in the first room.

**[0139]** In some embodiments, in addition to or instead of creating or updating the viewing history using, for example, one of the monitors discussed above, the interactive media guidance application may allow a user to manually create or update a viewing history. For example, the interactive media guidance application may provide one or more display screens that allows a user to specify a viewing history for an individual, a device, or a home network. The display screens may be accessible from an option in a menu provided by the interactive media guidance application that the user may navigate to and select. In other embodiments, a user may be allowed to enter in the content they have viewed, or that they have little or no interest in viewing, at a site that is remote from the home network, but is communicatively coupled to the interactive media guidance system. For example, the user may create or update a viewing history on a website. At the website, the user may specify that they have seen all of the episodes of the first two seasons of the television series "24", or that they have viewed certain episodes of the show "Seinfeld." The user may also describe, among other things, the date that they last viewed specified content, or the frequency with which they have viewed specified content. After the information has been entered, it may be downloaded and incorporated into or supplant an existing viewing history.

**[0140]** FIG. 14 shows an illustrative screen 1400 provided by an Internet website in which users may manually specify their viewing history. Generally, allowing a user to manually specify or update certain components of their viewing history may be important to more accurately reflect their complete viewing history that has not automatically been captured by the interactive media guide application. This may be necessary for the entry of, for example, programming that a viewer watched prior to the installation of the interactive media guide application, or programming that a viewer watches in an environment outside of the interactive media guide application. Returning to FIG. 14, it will be understood that screen 1400 may also be provided locally by the interactive media guidance application. First, the user may specify a title or description of the previously viewed content in text field 1402. Aides such as an on-screen keyboard or voice dictation may be provided to assist the user in entering in this information into text field 1402. After entering in



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the title or description of the previously viewed content, the user may select button 1404 to look up the entered content in a database of all the available content. The interactive media guidance application may present either the content that matches the entered information, or a number of the closest matches, to the user in one or more additional screens. The user may then select the appropriate content, and that content may then be displayed in a format recognizable by the interactive media guidance application in text field 1402.

**[0141]** Alternatively, if the user is not familiar with the title or the description of the previously viewed content, the user may select button 1406 to search for content. In response to the selection of button 1406, the interactive media guidance application may provide the user with one or more screens for specifying various parameters or criteria for the previously viewed content. For example, the user may be provided with the opportunity to specify the genre of the content (which may be divided into a category and subcategory, such as movies and drama, television show and sitcom, sports and baseball, or advertisement and car commercial), the date the content was viewed, the channel on which the content was viewed, or additional qualifiers that further narrow the content (e.g., rating, actors). After the parameters are entered, the interactive media guidance application may perform a search based on the entered parameters and provide the user with an opportunity to select from the content that matches the entered parameters.

**[0142]** After identifying the previously viewed content, the user may have an opportunity to provide further details about the previously viewed content. For example, the user may enter in selection area 1408 the dates that the content was viewed (for determining the exact episodes of a television series that the user viewed), or the seasons that the content was viewed. Using drop-down menu 1410, the user may specify, among other things, how many times the content was viewed, how often the content was viewed (e.g., twice in the past week), the date the content was last viewed, how much of the content the viewer viewed (information that may be used by the bookmark monitor), etc.

**[0143]** When the user has specified the details about the previously viewed content, the user may specify the profile that should be updated by the manually entered previously viewed content. To do this, the user may type in the name of the user, device or household into text field 1412. If the user wants to make the manually entered content part of a new profile, the user may select button 1414. In response to selection of button 1414, the interactive media guidance application may prompt the user to enter in the name of the new profile, as well as any additional information associated with the new profile. The user may also select button 1416 to browse the available profiles and select the appropriate one. If the user wishes to update multiple profiles based on the entered information regarding previously viewed content, the user may identify a first profile, and then select button 1418 to add more user profiles. In response to selection of button 1418, the interactive media guidance application may prompt the user to enter in names of the additional profiles by direct entry or browsing the database of profiles.

**[0144]** After selecting in the desired profile or profiles to be affected by this information, the user may further specify whether the manually entered viewing history should be incorporated with the existing viewing history associated with the selected profile or profiles, or should replace the viewing history for the selected profile or profiles. If the user selects radio button 1420, the interactive media guidance application may add the entered viewing history into the existing viewing history for the selected profile or profiles. If the user selects radio button 1422, the interactive media guidance application may replace the existing viewing history for the selected profile or profiles with the entered viewing history.

**[0145]** The user may be provided with the opportunity to select how the manually entered content should affect different interactive content displays or functions provided by the interactive media guidance application where the "New to Me" feature is applicable. If the user selects checkbox 1424, the interactive media guidance application will take the manually entered viewing history into consideration in automatically generated displays of content (i.e., the manually entered content, such as advertisements or programming, will not be automatically displayed to the viewer) . If the user selects checkbox 1426, the interactive media guidance application will take the entered viewing history into consideration in automatic recording operations (e.g., in connection with the recording of a season of a television series). If the user selects checkbox 1428, the interactive media guidance application will take the entered viewing history into consideration when presenting recommendations. If the user selects checkbox 1430, the interactive media guidance application will take the entered viewing history into consideration when presenting search results. If the user selects checkbox 1432, the interactive media guidance application will take the entered viewing history into consideration when displaying visual indicators for listings of previously viewed or unviewed content, as will be discussed below in connection with FIGS. 19A-G. If the user selects checkbox 1434, the interactive media guidance application will take the entered viewing history into consideration when displaying visual indicators for displays of previously viewed or unviewed content, as will also be discussed below in connection with FIGS. 21A-H. If the user wishes to select all of the above options, the user may select checkbox 1436. If the user does not select any of checkboxes 1424-1436, the interactive media guidance application may apply the entered viewing history to the same functions specified for the existing viewing history, or according to a default rule, which will be described in connection with FIG. 22.

**[0146]** When a user has entered in the viewing history and the other above-described details concerning it, the



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user may submit this information to the website by selecting submit button 1438. The user may also clear the entered information, or cancel out of the function to enter a viewing history completely, by selecting clear button 1440 or cancel button 1442, respectively. Once the information has been submitted, it is processed, and the viewing history details and corresponding instructions, such as the interactive media guidance applications functions that should be affected by the entered viewing history, are transmitted in an appropriate format to the appropriate interactive media guidance system or systems. Alternatively, if the feature of manually entering a viewing history is provided by a local interactive media guidance system, the local interactive media guidance application may process and format the information and transmit it directly to the appropriate interactive media guidance system or systems.

**[0147]** FIG. 15 shows illustrative flow diagram 1500 for allowing a user to manually enter a viewing history of previous viewed content in accordance with the principles of the present invention. First, at step 1502, the interactive media guidance application allows a user to specify previously viewed content and details concerning the viewing of the specified content. At step 1504, the interactive media guidance application compiles a viewing history based on the information entered in by the user at step 1502. At step 1506, the user specifies a new or existing user, device or household profile to which the viewing history should be applied. At step 1508, the interactive media guidance application applies the viewing history specified at step 1502 to the profile specified at step 1506. At step 1510, the user specifies how the viewing history should affect the functionality of the interactive media guidance application. At step 1512, the interactive media guidance application updates its own functionality for the profile specified at step 1508 according the specification by the user at step 1510. More generally, it will be understood that steps 1504, 1508 and 1512 may occur after the user has submitted the information in steps 1502, 1506 and 1510 by, for example, selecting submit button 1438 in FIG. 14.

**[0148]** The viewing history may be stored on one or more databases, which may be either or both locally or remotely accessible by the user devices and/or home networks. In addition, as will be discussed in more detail below, profiles such as user profiles, device profiles, and/or home network profiles may also be stored on databases.

**[0149]** FIG. 16 is an illustrative block diagram of an illustrative home network 113 that shows user equipment devices 1602, 1604, 1606 and 1608 each being directly connected to a database 1612, which may store, among other things, viewing history data. Although a home network topology similar to that discussed in connection with FIG. 8a is being used to discuss a database that may store viewing history data, it will be understood that other home network configurations or topologies may be used such as those discussed in connection with FIGS. 8b-c, 9, 10, and 11. User equipment devices 1602, 1604, 1606 and 1608 may send viewing history data to and receive the same from the same database server via communication paths 1614, which may be any suitable communications path for in-home networks, such as wired paths, cable paths, fiber-optic paths, wireless paths, or a combination of such paths. The connection between and database 1612 and user devices 1602, 1604, 1606, and 1608 illustrates that the viewer history data is accessible by user devices communicatively coupled to the home network. Such accessibility may ensure that all user devices are properly configured to manage content according to, for example, a particular individual, a selected device, or home network.

**[0150]** Moreover, it will further be understood that FIG. 16 shows storing viewer history data for a given home network in a single database on a single, local, standalone server, which is accessible by all the user equipment devices in the home network is merely illustrative. A wide range of alternative arrangements exist for viewer history data. For example, the database may be stored at one of the user equipment devices in the home network (shown as database 1616); the database may be communicatively coupled to the home network as shown with database 1618, or it may be located in a remote location outside of the home network as shown with database 1620 (e.g., at a user equipment device or server within a different home network, at a distribution facility, a server, etc.). In other embodiments, the database may be split up or duplicated for redundancy or added performance, and distributed among any permutations of the previously described locations, or at other suitable sites for hosting such information, in any suitable manner. In addition, the database may, for example, be accessible by only a subset of the user equipment devices in the home network, either because the other user equipment devices lack a communicative coupling to the database, or because those other user equipment devices lack the proper authorization to access the particular database, user profile, or viewing history of interest. In those instances, the user equipment devices that do not have direct access to the database may establish communicative links with user equipment devices that can access the database.

**[0151]** The content may be identified using unique identifiers such as strings or numbers that are stored by the interactive media guidance system when the content is viewed by the user. In other embodiments, the interactive media guidance application may store the identifiers for all the content that a particular user has not previously viewed.

**[0152]** The interactive media guidance application may store viewing history in any number of ways. In some embodiments, when the viewer history of interest is stored at a location other than at the user equipment device in use, the user equipment may download and retain a locally cached copy of the viewing history. The interactive media guidance application may then make mod-



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ifications to the viewing history of the locally cached copy and then upload the updated viewing history to the externally located database at predefined intervals, on demand (e.g., in response to a request to furnish such information) or in response to a user action (e.g., logging out of the user equipment device), or by any other approach.

**[0153]** FIG. 17 shows several different types of interactive content that may be generated and displayed by the interactive media guidance application. As shown, FIG. 17 includes menus 1702, program listings 1704, recommendations 1706, search results 1708, advertisements 1710, and additional information 1712. Menus 1702 may include textual menus that enable users to navigate the various functions provided by the interactive media guidance application. Program listings 1704 may include display of available programming of any of the types previously mentioned. Such listings may be organized, for example, by channel, by date, by genre, by user-specified criteria, or by any other suitable manner. Recommendations 1706 may include any displays of recommendations by the interactive program guidance application to a user of available programming or other content for viewing or recording. Search results 1708 may include results of searches that are conducted by users, or automatically performed by the interactive media guidance application for available content. Advertisements 1706 may include the types of advertisement 1206 described in connection with FIG. 12. Finally, additional information 1712 may encompass any of type of information generated by the interactive media guidance application and not described above.

**[0154]** Content management at the individual level is now described. Managing content on an individual basis within a home network may enable the media guidance system to provide interactive content that is specific to each user regardless of which user device the user uses. Individualized content management offers many advantages that enhance a particular user's media guidance application experience. For example, when a first user views a particular program (e.g., a television show) in the living room, the system may update a viewing history for the first user, to reflect the fact that the first user has viewed that particular program. Thereafter, when the first user retires to the bedroom (or any other room having a user device communicatively coupled to the home network), and decides to watch another program, the system may omit the listing of the particular program that the first user viewed in the living room from a listing of programs that may be displayed on a user device in the bedroom. By contrast, if a second user accesses the user device in either the living room or the bedroom and has not viewed the particular program viewed by the first user, the system may display the particular program in a listing for the second user. It is understood that the references to living room and bedroom are merely illustrative and are not intended to be limiting. It is further understood that the system is not required to omit the particular program from a listing of programs, but that this is one of many different ways in which content can be displayed. For example, the particular program listing may be "specially" presented to indicate that the particular program has been viewed by the first user or additional information (e.g., information indicating the particular program was date last viewed) may be displayed in connection with the particular program listing. Additional examples for different ways content may be displayed are discussed in connection with the description accompanying FIG. 17.

**[0155]** Another advantage of individualized content management may be applied to settings or preferences. For example, any settings a particular user sets at any of the user devices can automatically be applied to all user devices coupled to the home network. Thus, there is no need for the particular user to manually define any desired settings for each user device coupled to the home network. Moreover, whenever the particular user changes a setting on one of the user devices, the updated settings may be applied to all user devices without requiring additional user input. Such settings may be stored, for example, as part of a user profile. It is noted that the viewing history, which may include settings, may be stored as part of a user profile.

**[0156]** FIG. 18a shows illustrative flow diagram 1800 for displaying interactive or media content based on the viewing history for an identified user using a user device communicatively coupled to a home network. At step 1802, the identity of a user using a user device communicatively coupled to a home network is determined. In one embodiment, the identity of a user may be determined when the user selects a user profile. Referring briefly to FIG. 19, an illustrative user profile selection screen 1900 is shown. Display screen 1900 may be displayed in response to the selection of a button or buttons on a remote control or by navigating a highlight in an interactive media guidance application means to select an option that causes screen 1900 to be displayed. Screen 1900 may include user profile selection area 1902, user profile create button 1904, user profile delete button 1906, and user profile modify button 1908. It is understood that the contents of screen 1900 are merely illustrative and that additional buttons and other selectable features may be added, and that various features may be omitted.

**[0157]** User profile selection area 1902 may include a highlight region 1910 and user profile buttons 1912, 1914, and 1916. User profile buttons 1912 correspond to user profiles created for a particular individual (shown as Mom and Mary). User profile button 1914 corresponds to a user profile created for a group of individuals (shown as Family). For example, a group profile may be selected when both Mary and Mom are viewing programming. User profile button 1916 corresponds to an anonymous or guest user (shown as Guest). For example, button 1916 may be selected when a user does not have a profile or wishes to view programming without having his or her interactions with the media guidance application moni-



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tored as part of a specified individual or group profile. The interactive media guidance application may allow the user to navigate highlight region 1910 to one of user profile buttons 1912, 1914, and 1916 and select the highlighted user profile button. When the user selects one of the user profile buttons 1912, 1914, and 1916, the identity or identities of the user or users, or whether the user is anonymous, is determined.

**[0158]** The interactive media guidance application may further allow the user to navigate highlight region 1910 to user profile create button 1904, user profile delete button 1906, or user profile modify button 1908, and if desired the user may select a highlighted button. Selection of user profile create button 1904 may cause the interactive media guidance application to display one or more setup screens for the purpose of creating a new user profile. Selection of user profile delete button 1906 may cause the interactive media guidance application to delete a specified user profile that has been created. In some embodiments, in response to the selection of the user profile delete button 1906, the interactive media guidance application may position highlight region 1910 on one of user profile buttons 1912 in user profile selection area 1902 to allow the user to select the user profile that the user would like to delete. Selection of user profile modify button 1904 may cause the interactive media guidance application to display one or more setup screens for the purpose of modifying an existing user profile.

**[0159]** Referring back to FIG. 18a, an identification system may be used in addition to, or in lieu of, the user profile selection screen 1800 to perform step 1802 of determining the identify of the user. An identification system (e.g., system 620 of FIG. 6) may enable the interactive media guidance application to intelligently identify the user or users using the user device communicatively coupled to the home network. For example, the identification system may perform fingerprinting, retinal or thermal scanning in order to determine the user and load the corresponding user profile.

**[0160]** At step 1804, the viewing history of the identified user is provided. As discussed above, the viewing history may be stored on a database that is communicatively coupled to a user device being used by the identified user, If desired, the viewing history may be stored in a user profile associated with the identified user and it is the user profile that is stored on the database. In some embodiments, the user profile and/or viewing history information for a user may be made publicly or privately available to some or all user equipment devices within or outside of a home network.

**[0161]** The interactive media guidance system may identify all the user equipment devices in a home network or elsewhere that are using the same user profile in order to provide up-to-date information on the viewing history of the identified user. In some embodiments, for example, an interactive media guidance application at a user equipment device on which a user has logged in (e.g., selected a user profile) or has been identified by an identification system may make a determination as to which, if any, user equipment devices in the home network are using the same user profile, and then proceed to communicate directly with those user equipment devices. In other embodiments, whenever the one or more databases for storing viewing history data and/or user profiles receive updated data, the database or databases may automatically communicate the entire updated viewing history and/or user profile, or only the updated portion of the viewing history and/or user profile to those other user equipment devices having viewing history data and/or user profile data for the identified user.

**[0162]** At step 1806, interactive content is generated based on the viewing history of the identified user for display on user equipment that is communicatively coupled to the home network. Interactive content generally refers to any type of display screen or series of screens such as menus, prompts, listing of programming, etc., that are generated by the interactive media guidance application and that either prompt or are the result of user interaction. In some embodiments, for example, the interactive media guidance application may generate (based on the viewing history) a listing of programming in which the media content (e.g., television programming) that the identified user has previously viewed, or at least has identified as being viewed, from the list. The listing may be a favorites listings, a recommendation listing, or a search results listing of programming.

**[0163]** The various parameters or monitors for a viewing history may be further used in the determination of whether to display previously viewed content. If desired, the interactive media guidance application may define or allow the user to define thresholds for determining whether programming or other content should actually be displayed even though it has been previously viewed. For example, a user may instruct the interactive media guidance application not to remove content from generated displays of interactive content unless, for instance, the content was viewed before a specified date or viewed within a range of dates, or unless the content was viewed at least a specified number of times or within a range of times. In other embodiments, the interactive media guidance application may define or allow the user to define a set of weighted criteria, including whether the user has previously viewed the media content, for determining whether to remove the previously viewed content from displayed interactive content.

**[0164]** The feature of removing from displays of interactive content the media that the user has previously viewed has numerous applications. For example, an interactive media guidance application may use the information regarding the media content that a user has already viewed to modify the list of programs that it may actively recommend a user to watch or record on the basis of, among other things, preferences that have been specified by the user. In other embodiments, the interactive media guidance application may remove from a



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search conducted by the user for particular media content or categories of media content the media that the user has previously seen. In still other embodiments, the interactive media guidance application may, automatically or in response to user input, filter and remove from displays of program listings of future programming the media content which the identified user has previously viewed.

**[0165]** In yet other embodiments, the interactive media application may provide results of a search including only the programming the user has not seen. For example, if the user searches for content on Lucille Ball and the entire "I LOVE LUCY" collection (e.g., all 300 episodes) is available on a VOD server, the media application may display listings for the programs the user has not seen. That is, the media application may not display all 300 episodes if the user has seen, for example, 230 of them. More generally, it will be understood that the interactive media guidance application may remove any type of content from any of the types of interactive content defined in FIG. 17 if the content has been previously viewed.

**[0166]** It will be understood that the above-described embodiment of the present invention may be applied to various home network environments. In one illustrative example, a user who has viewed television programming at a user equipment device in one room of their home may not be interested in viewing the same programming again, regardless of the user equipment device which the user is using. To solve this, the present invention allows the user to simply create a user profile for himself or herself, and then select the user profile at any user equipment device in the home network prior to using the user equipment device.

**[0167]** Besides using a user's viewing history to remove previously viewed media content from displays of interactive content, the interactive media guidance application may remove previously viewed media content from displays of media content, as in specified in step 1806 of FIG. 18a. In some embodiments, advertisements (e.g., commercials) or other forms of promotional media, such as previews of television programs or movies, that a given user has already seen may be suppressed from display and substituted with advertisements that the user has not yet seen. As a result, this feature may help advertisers better attract potential buyers of their products. One scenario in which this feature may be particularly beneficial is with serial advertisements, which are a set of advertisements that, when strung together, are designed to tell a story. Such advertisements may be played sporadically and not in any particular order. By presenting a user with only those advertisements that he or she has not previously seen, then, the interactive media guidance application helps viewers to view all of the different individual advertisements within a given set of serial advertisements, and thus be able to piece together the underlying storyline behind the advertisements.

**[0168]** The interactive media guidance application may provide further support for situations where a user decides to operate a user equipment device in a home network without first selecting a user profile. Some users may not want to go through the burden of choosing a user profile prior to using the user equipment device. In such cases, the interactive media guidance system may, for example, add the programs that the anonymous user has viewed to the viewing history of all of the stored user profiles for the home network. In other embodiments, the interactive media guidance system may provide one or more setup screens for handling the viewing history of anonymous users. The setup screens may provide options that allow a user to specify explicitly those user profiles that are to include the viewing history of anonymous users.

**[0169]** In some embodiments, the interactive media guidance application may generate displays of previously viewed content using predetermined criteria. For example, the interactive media guidance application may rank previously viewed programs and display the programs based on their ranking. A more detailed discussion of ranking is discussed below in connection with FIG. 20.

**[0170]** In some embodiments, the interactive media guidance application may support identification of multiple users viewing a user device that is communicatively coupled to a home network. FIG. 18b shows illustrative flow diagram 1810 of an embodiment that supports multiple user identification in accordance with the principles of the present invention. Beginning at step 1812, the identity of a plurality of users viewing content on a particular user device that is communicatively coupled to a home network is determined. The identity of the users may be determined based on selection of multiple user profiles or by an identification system (e.g., identification system 612 of FIG. 6). At step 1814,
the content (e.g., television programming) being viewed on the user device is monitored. At step 1816, a viewing history of each identified user is updated.
Such updating enhances content management for each user because the viewing history for each user now reflects the fact that the particular program has been viewed by the identified users. For example, after a group of users watch a recording of the movie "When Harry Met Sally," a future generated list of recorded programing may not display the "When Harry Met Sally" program listing.

**[0171]** Content management at the user device level is now described. Managing content on a user device level within a home network may enable the media guidance system to provide interactive content that is based on the content viewed at a selected user device. In one embodiment, a selected user device may be treated as the master and the other user devices be treated as slaves. In a master/slave arrangement, the viewing history may be created, modified, or updated based on the content viewed at the master user device. Thus, the interactive content generated for display on both the master and slave devices is based on the viewing history of the master user device.



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**[0172]** FIG. 18c shows flow diagram 1820 to illustrate content management at the user device level in accordance with the principles of the present invention. At step 1822, one of several user devices that are communicatively coupled to a home network is selected. For example, the interactive media guidance application may allow the user to select a desired user device by selecting a user device profile. As another example, hardware protocols (e.g., bios settings) may be configured to select a particular user device. At step 1824, a viewing history for the selected user device may be provided. At step 1826, the interactive media guidance application may generate interactive content based on the viewing history of the selected user equipment for display on user equipment communicatively coupled to the home network.

**[0173]** Content management at the home network level and across multiple home networks is now described. Managing content on a home network level enables the media guidance system to provide interactive content that is based on the content viewed at any one of several user devices communicatively coupled to a home network. In this arrangement, whenever an item of programming is viewed on a user device that is communicatively coupled to the home network, that program may not be presented in a listing of programming on that particular user device, nor any other user device that is communicatively coupled to the home network. It will be understood that this arrangement can be contrasted to the master/slave arrangement as discussed above in connection with FIG. 18c. In fact, this arrangement is akin to master/master relationship, where each user device communicatively coupled to the home network may manage content. For example, assume that a home network is communicatively coupled to three different user devices. If "Superman" is viewed on a first user device, a viewing history for the home network may be updated to reflect this viewing event. Thus, none of the user devices may display "Superman" in a listing of programming. If "Wonderwoman" is viewed on a second user device, the viewing history for the home network is updated to reflect this viewing event. Again, none of the user devices may display "Wonderwoman" in a listing of programming.

**[0174]** FIG. 18d shows illustrative flow diagram 1830 managing content based on the viewing history at home network. At step 1832, a plurality of user devices that are communicatively coupled to a home network is provided. At step 1834, a viewing history for the home network is provided. At step 1836, interactive content based on the viewing history of the home network is generated for display on all of the user devices that are communicatively coupled to the home network.

**[0175]** Managing content across two or more home networks may enable the media guidance system to provide interactive content that is based on the content viewed at a selected home network or viewed at each home network. For example, a user may have a first home network (e.g., located at his or her house) and a second home network (e.g., located at his or her vacation house). In one embodiment, which assumes that the first home network is the selected home network, any item of programming that is viewed at the first home network may not be presented in a listing of programming at the second network. In another embodiment, assuming that none of the home networks are selected, any item of programming viewed at the first network may not be presented in a listing of programming at the second network, and any item of programming viewed at the second network may not be presented in a listing of programming at the first network.

**[0176]** FIG. 18e shows illustrative flow diagram 1840 for displaying interactive content based on the viewing history of a selected home network in accordance with the principles of the present invention. At step 1842, a home network is selected out of at least two home networks that are communicatively coupled to each other. At step 1844, a viewing history is provided based on the selected home network. At step 1846, interactive content based on the viewing history of the selected home network is generated for display at each home network.

**[0177]** It is understood that in cross-coupled home network arrangements (e.g., see FIGS. 11c and 11d), a selected user device or an identified user may determine the interactive content that is generated for display for user devices communicatively coupled to the cross-coupled home networks.

**[0178]** The foregoing discussion of managing content across multiple home networks illustrates the ability to share a viewing history for a particular home network with external user equipment devices or home networks. This concept may extend to the user-level and device-level aspects of the present invention as well. For example, a user at a user equipment device that is outside of a home network may still access the profile for a particular user or device within the home network, provided that the user equipment device is communicatively coupled to the home network. In this manner, a user spending time at their vacation house may access a user or device profile from their regular house, which may have a more complete viewing history for the user and therefore be more desirable.

**[0179]** FIG. 20 shows illustrative flow diagram 2000 for displaying ranked interactive content based on a predetermined criteria that is applied to previously viewed programming. At step 2002, the interactive media guidance application may assign rankings to some or all of the previously viewed media (e.g., an episode of a television series, a movie, or an advertisement) based on one or more criteria. In some embodiments, the interactive media guidance application may rank previously viewed media on the sole basis of when the media was last viewed. In other embodiments, the interactive media guidance application may assign a cumulative ranking to each previously viewed media based on a number of criteria that may include when the media was last viewed, how frequently the media was viewed, and any particular preferences that the user has specified for the media. The



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criteria may be weighted in determining the ranking for the particular media that has been previously viewed. Parameters such as the different criteria for determining the ranking of previously viewed media, whether or not they are weighted, the particular weightings for each of the different criteria, and the specific media or types of media to actually apply the ranking to may be preset by the interactive media guidance application in an optimized fashion, or may be customized by the user and for each user profile, using for example a display screen provided by the interactive media guidance application for specifying such settings.

**[0180]** After rankings have been applied to the previously viewing media, the interactive media guidance application may, at step 2004, display interactive content or media content based on the assigned rankings. By default, unviewed content may be ranked higher than previously viewed content. In some embodiments, previously viewed media content that was more recently viewed or that has been viewed more often, for example, may be ranked lower, and as a result may be less likely to be displayed, or may be displayed lower in a ranked list of interactive content. In other embodiments, previously viewed media content that has been ranked may be displayed in interactive content based on a color gradient that corresponds with the ranking of the previously viewed content. In this manner, interactive listings for content that has been viewed more recently or that has been viewed more frequently may appear brighter or more intense than interactive listings for less recently or less frequently viewed content, or vice-versa. In still other embodiments, the viewing history for previously viewed media content, such as the date that the content was last viewed, or the number of the times that the content was viewed, may be displayed in the interactive content generated by the interactive media guidance application.

**[0181]** Media content may similarly be displayed based on rankings of previously viewed content. In some embodiments, advertisements or promotional media that were more recently or more frequently viewed than other available media content may be less likely to be displayed.

**[0182]** FIGS. 21A-F show illustrative content 2100 that may be generated and displayed by the interactive media guidance application based on a viewing history for an identified user, a selected device, or a home network in accordance with the present invention. In particular, FIGS. 21A-F show different illustrative visual indicators that may be used by the interactive media guidance application to represent displays and/or listings of previously viewed content. In FIGS. 21A-F, display screen 2100 may include selectable advertisement 2102, selectable pay-per-view ("PPV") advertisement 2104, picture-in-guide ("PIG") screen 2106, and program listings 2108, 2110, 2112 and 2114. Advertisements 2102 and 2104 may be referred to as selectable advertisements because the user can select the advertisements, and in response, the user may be provided with an opportunity to order the advertised product, may be automatically directed to the advertised show, etc.

**[0183]** In FIG. 21A, program listing 2108 for the movie "Matrix" is displayed with a watched icon to indicate that the movie has been previously viewed. In FIG. 21B, program listing 2110 for the movie "Top Gun" is displayed with text indicating that the movie was last viewed on October 26, 2005. In FIG. 21C, program listing 2112 for the movie "X-Men" is shaded to denote that the movie has been previously viewed. As described above in connection with FIG. 20, the brightness or color of program listing 2112 may vary based on factors such as, for example, the date that the content corresponding to the program listing was last viewed, how often it was viewed, etc. In FIG. 21D, program listing 2114 for episode three from season one of the television series "Entourage" is displayed with textual information describing that the particular episode has been viewed two times. In FIG. 21E, selectable advertisement 2102 and selectable PPV advertisement 2104 may include visual indicators to denote that either the particular advertisement or the advertised content has been previously viewed. For example, as shown in FIG. 21E, selectable advertisements 2102 and 2104 may be displayed with the circle icon with the letter "W" to denote that either the particular advertisement, or the advertised content has been previously viewed. Different visual indicators may be used to distinguish for the viewer when advertisements themselves have been previously viewed from when the content being advertised has been viewed. In FIG. 21F, PIG screen 2106 may also display an indicator that content has been previously viewed when, for example, a user selects one of the program listings 2108, 2110, 2112, or 2114 or one of selectable advertisements 2102 or 2104 using highlight region 2118, and media content relating to the selected listing or advertisement is displayed in the PIG.

**[0184]** In some embodiments, the interactive media guidance application may display visual indicators to denote that content is "New to Me" instead of or in addition to displaying visual indicators to denote previously viewed content, as is shown in FIGS. 21A-F. As will be explained below in connection with FIG. 22, the decision to display visual indicators for unviewed versus viewed content may be set by the user. If this preference has not yet been specified by the user, the interactive media guidance application may by default (i.e., according to a default rule either chosen by the user or defined by the interactive media guidance system) display visual indicators in accordance with one of the above-described alternatives. If the interactive media guidance application is in fact configured to display visual indicators for previously unviewed content, visual indicators similar to those described above may be employed. For example, a rectangular icon with the word "New to Me", or a circular icon with the letters "NM" may be used to denote content that is new to the viewer, according to the particular user, device or household profile that has been loaded. Alternatively, the previously unviewed content (e.g., program



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listing, advertisement, or PIG screen content) may be shaded to indicate that it is new. The shading for previously unviewed content may be purposely set to be a different color or level of brightness from the shading for previously viewed content to make it easier for a user to distinguish the two types of content when, for example, the user desires to view different visual indicators for both unviewed and viewed content. Also, any combination of the visual indicators described above may be used to denote unviewed or viewed content. For example, the interactive media guidance application may apply shading to represent previously unviewed or viewed content within the program listing portion of a display screen, and then apply the circular icons to the advertisement, PIG or other areas of the display screen where previously unviewed or viewed content may be presented. The actual visual indicators that are to be employed for the different areas of a display may be specified either by the user or by the interactive media guidance system. Moreover, it will be generally understood that the visual indicators described in FIGS. 21A-F are only illustrative and not intended to be limiting, and that other forms of indicators appropriate for interactive media guidance applications may be used to represent unviewed or viewed content.

**[0185]** FIG. 21G shows an illustrative screen in which previously viewed content has been ranked according to predetermined criteria. Here, it will be assumed program listings 2108, 2110, 2112 and 2114 all correspond to previously viewed content, and are ranked according to the date that the content was last viewed. The interactive media guidance application may' rank the most recently viewed program first, and thus display the most recently viewed program on the top of the display. Alternatively, the user may specify, or the interactive media guidance application may automatically set, a different order in which the previously viewed content should be ranked. Also, as discussed above, the ranking may be determined based on a weighted combination of criteria that again may be specified by the user or automatically set by the interactive media guidance application. Therefore, if, for example, program listings 2108, 2110, 2112 and 2114 were ranked on the basis of not only when the content represented in the listings was last viewed, but also how many times the content was viewed, it is entirely possible that program listing 2110 for "Top Gun" may not be the highest ranked program listing, and thus would not be displayed. Also, it will be understood that the indicators that are displayed in a ranked list do not necessarily have to correspond to the way in which the content is being ranked. For example, as will be explained below in connection with FIG. 22, the user may specify that visual indicators for identifying the frequency with which previously viewed content was viewed be used, and then separately specify that the criterion of when content was last viewed be used to rank such content.

**[0186]** FIG. 21H illustrates the use of "New to Me" visual indicators to denote content that has been previously viewed, where the previously viewed content corresponds to reruns or repeats of television program episodes (i.e., episodes that have aired at least once in the past). FIG. 21H shows a display screen 2150 that may include selectable advertisement 2152, selectable PPV advertisement 2154 and PIG screen 2156. Display screen 2150 also includes program listings 21.58, 2160, 2162 and 2164 that each correspond to an episode of a television series. Each of program listings 2158, 2160, 2162 and 2164 may be selected using highlight region 2166.

**[0187]** It is seen in FIG. 21H that program listings 2158, 2160, and 2164 are all indicated as being reruns. However, "New to Me" indicators 2168 are displayed only in connection with program listings 2160 and 2164, meaning that although the episodes identified by program listings 2160 and 2164 -- Season 1, Episode 9 of Prison Break and Season 1, Episode 3 of Entouragehave presumably aired before, depending on the profile that has been loaded, those reruns have not been previously viewed by the corresponding viewer, device or household.

**[0188]** This example emphasizes the usefulness of the "New to Me" feature applied to television shows that have been airing for a considerable amount of time, or that are otherwise in syndication. When a particular episode of a television program is a rerun, the listing of, or the detailed program schedule information for the episode typically indicates that the episode is a rerun, suggesting to a viewer that they have already watched the episode. However, viewers who have only begun to consistently watch the television program often have not seen many of the reruns. It is not until the viewers start watching more episodes of the program that the episodes that are flagged as reruns actually correspond to episodes that the viewer has seen. These repeat indicators are thus at least initially of little use to viewers who did not begin to watch a television series from the outset, when the program first started airing. Compounding this problem is the fact that repeat indicators can sometimes be inaccurate. By enabling users to maintain a viewing history for a viewer, device or household, then, the "New to Me" feature alleviates these problems by keeping track of the precise episodes of the programs that have been previously viewed.

**[0189]** FIG. 22 shows an illustrative menu screen 2200 that allows a user to activate, deactivate and configure the "New to Me" feature at will. In some embodiments, menu screen 2200 may be presented to a user, by default, immediately preceding or following the display of profile selection screen 1900 shown in FIG. 19. Menu screen 2200 may also be generally designed to be accessible at any time by pressing a corresponding "New to Me" function button on the remote control, or by selecting a "New to Me" function button displayed on any display screen generated by the interactive media guidance application. In particular, screen 2200 may include buttons 2202, 2204, 2206 and 2208. It is understood that



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the contents of screen 2200 are merely illustrative and that additional selectable features may be added, and that existing features may be omitted.

**[0190]** Button 2202 allows a user to run the "New to Me" feature on specific content. Thus, button 2202 may be selected when a user is interested in invoking the feature only on content for which the user believes that it worth identifying whether the content has been previously viewed. In response to selection of button 2202, the user may be presented with another screen for specifying the type or types of content that the user wishes to invoke the "New to Me" feature on. For example, the user may specify to invoke the feature only on advertisements, or on specific television programs, or on specific genres of movies. Any suitable type of display screen for entering in such information may be provided by the interactive media guidance application.

**[0191]** Button 2204 enables a user to run the "New to Me" feature on specific functions or interactive content provided by the interactive media guidance application. In response to selection of button 2204, the interactive media guidance application provide one or more display screens in order to allow the user to select the type of functions or interactive content that the "New to Me" feature should impact. For example, the user may choose to turn on the "New to Me" feature only with respect to menu displays, program listing displays, recommendations, search results, automatic displays of advertisements or other content, any combination of these functions or interactive content, or any additional types of functions or interactive content supported by the interactive media guidance application for which the "New to Me" feature is applicable. The amount of user control may be even more refined in that a user may choose that, for each type of applicable function, a different "rule" be provided. The different available rules may include not displaying previously viewed content, displaying previously viewed or unviewed content using indicators, and displaying previously unviewed content according to a ranking. Where appropriate, these rules may be combined. For example, a user may opt to display previously viewed content using indicators and according to a ranking. Alternatively, selection of these rules may be applied globally across and independent of the different functions provided by the interactive media guidance application for which the "New to Me" function applies (e.g., by a button other than button 2204). The interactive media guidance application may also set a default rule that applies absent any selection of a rule by a user.

**[0192]** Button 2206 enables a user to activate the "New to Me" function on all the available types of content provided, and for every instance in which the "New to Me" function is applicable. In some embodiments, absent any specification by the user, the interactive media guidance application may run the "New to Me" function by default according to this nondiscretionary rule. In response to selection of button 2206, the interactive media guidance application may proceed to track the viewing history of all content for the specified user, device or household profile, and then use this information to update or modify the functions or interactive content provided based on this viewing history.

**[0193]** Button 2208 allows a user to configure additional options associated with the "New to Me" feature. For example, by selecting button 2208, the user may be presented with the opportunity via one or more display screens to, among other things, explicitly set the different types of visual indicators to be employed by the interactive media guidance application as described above in connection with FIGS. 21A-H, set default rules, etc.

**[0194]** Finally, button 2210 enables a user to voluntarily turn off the "New to Me" feature. In response to selection of button 2210, the interactive media guidance application may completely stop keeping track of the content viewed by the user.

**[0195]** The foregoing is merely illustrative of the principles of this invention and various modifications can be made by those skilled in the art without departing from the scope and spirit of the invention.

**[0196]** The following embodiments are disclosed:

1. A method for using an interactive media guidance application implemented on a user equipment device, comprising:

   providing a profile for use by the interactive media guidance application, wherein the profile comprises a viewing history of previously viewed content, and further wherein the profile is shared among a plurality of user equipment devices; and
   displaying interactive content using the interactive media guidance application based on the viewing history for the profile.

2. The method of item 1, further comprising receiving a user input for selecting the profile.

3. The method of item 1, further comprising automatically selecting the profile using the interactive media guidance application.

4. The method of item 1, wherein the interactive media guidance application automatically selects the profile after a predetermined time.

5. The method of item 4, wherein the predetermined time is set by a user, or is set by default by the interactive media guidance application.

6. The method of item 1, wherein the profile corresponds to a user profile comprising a viewing history of previously viewed content by a user associated with the user profile.

7. The method of item 1, wherein the profile corre-



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sponds to a device profile comprising a viewing history of previously viewed content on one of the user equipment devices.

8. The method of item 1, wherein the plurality of user equipment devices comprises a smaller plurality of user equipment devices that are located in a household, and further wherein the profile corresponds to a household profile comprising a viewing history of previously viewed content by the smaller plurality of user equipment devices located in the household.

9. The method of item 1, wherein the previously viewed content comprises programming, advertisements, content identified based on interactions by a user with the interactive media guidance application, or additional information.

10. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying a display of recommended content based on the viewing history for the profile.

11. The method of item 10, wherein the recommended content comprises advertisements, programming or additional information.

12. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying a display of results of a search for content based on the viewing history for the profile.

13. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying a display of program listings based on the viewing history for the profile.

14. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying an automatic display of content based on the viewing history for the profile.

15. The method of item 14, wherein the automatic display of content comprises advertisements, programming or additional information.

16. The method of item 1, wherein displaying interactive content using the Interactive media guidance application based on the viewing history for the profile comprises displaying an interactive menu based on the viewing history for the profile.

17. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying a display comprising at least one indicator to denote previously viewed or unviewed content.

18. The method of item 17, wherein a user sets whether the indicator should denote previously viewed content, previously unviewed content, or both.

19. The method of item 17, wherein the interactive media guidance application sets by default whether the indicator should denote previously viewed content previously unviewed content, or both.

20. The method of item 17, wherein the display comprises a first indicator to denote previously viewed content, and a second indicator to denote previously unviewed content.

21. The method of item 17, wherein the indicator comprises an icon, or a shading of the previously viewed or unviewed content.

22. The method of item 17, wherein the indicator indicates the last time the previously viewed content was viewed, the number of times the previously viewed content was viewed, how often the previously viewed content was viewed, or how much of the previously viewed content was viewed.

23. The method of item 17, wherein the indicator is displayed with an advertisement in a panel display.

24. The method of item 17, wherein the indicator is displayed with an advertisement to denote that the advertisement has been previously viewed or not viewed.

25. The method of item 17, wherein the indicator is displayed with an advertisement for an advertised program to denote that the advertised program has been previously viewed or not viewed.

26. The method of item 17, wherein the indicator is displayed with a program listing for a particular program to denote that the particular program has been previously viewed or not viewed.

27. The method of item 17, wherein the indicator is displayed in a picture-in-guide display to denote that content displayed in the picture-in-guide display has been previously viewed or not viewed.

28. The method of item 27, wherein the content displayed in the picture-in-guide display corresponds to an advertisement, a preview for a program, or a



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program.

29. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying interactive content that does not include the previously viewed content.

30. The method of item . 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying previously viewed content according to a rank within a display of interactive content.

31. The method of item 1, wherein the viewing history of previously viewed content is defined by the interactive media guidance application.

32. The method of item 1, wherein the viewing history of at least a portion of the previously viewed content is defined by a user.

33. The method of item 32, wherein the user enters the viewing history of the portion of the previously viewed content on an Internet website or on a display generated by the interactive media guidance application.

34. The method of item 1, wherein displaying interactive content using the interactive media guidance application based on the viewing history for the profile comprises displaying a portion of the previously viewed content that has not yet been viewed.

35. The method of item 1, further comprising receiving a user input to display interactive content using the interactive media guidance application based on the viewing history for the profile.

36. The method of item 1, further comprising receiving a user input to display interactive content using the interactive media guidance application based only on a portion of the previously viewed content in the viewing history for the profile.

37. The method of item 1, further comprising receiving a user input to display interactive content using the interactive media guidance application for only a portion of the functionality provided by the interactive media guidance application based on the viewing history for the profile.

38. The method of item 1, further comprising receiving a user input to stop displaying interactive content using the interactive media guidance application based on the viewing history for the profile.

39. The method of item 1, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

40. A system that uses an interactive media guidance application, comprising:

a plurality of user equipment devices connected by a network, wherein at least one of the plurality of user equipment devices is operative to:

provide a profile for use by the interactive media guidance application, wherein the profile comprises a viewing history of previously viewed content, and further wherein the profile is shared among the plurality of user equipment devices; and
display interactive content using the interactive media guidance application based on the viewing history for the profile.

41. The system of item 40, wherein at least one of the user equipment devices receives a user input for selecting the profile.

42. The system of item 40, wherein at least one of the plurality of user equipment devices automatically selects the profile.

43. The system of item 42, wherein the user equipment device selects the profile after a predetermined time.

44. The system of item 43, wherein the predetermined time is set by a user, or is set by default.

45. The system of item 40, wherein the profile corresponds to a user profile comprising a viewing history of previously viewed content by a user.

46. The system of item 40, wherein the profile corresponds to a device profile comprising a viewing history of previously viewed content on one of the user equipment devices.

47. The system of item 40, wherein the plurality of user equipment devices comprises a smaller plurality of user equipment devices that are located in a household, and further wherein the profile corresponds to a household profile comprising a viewing history of previously viewed content by the smaller plurality of user equipment devices located in the household.

48. The system of item 40, wherein the previously viewed content comprises programming, advertisements, content identified based on interactions by a



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user with at least one of the plurality of user equipment devices, or additional information.

49. The system of item 40, wherein the user equipment device is operative to display recommended content based on the viewing history for the profile.

50. The system of item 49, wherein the recommended content comprises advertisements, programming or additional information.

51. The system of item 40, wherein the user equipment device is operative to display results of a search for content based on the viewing history for the profile.

52. The system of item 40, wherein the user equipment device is operative to display program listings based on the viewing history for the profile.

53. The system of item 40, wherein the user equipment device is operative to display content based on the viewing history for the profile.

54. The system of item 53, wherein the automatic display of content comprises advertisements, programming or additional information.

55. The system of item 40, wherein the user equipment device is operative to display an interactive menu based on the viewing history for the profile.

56. The system of item 40, wherein the user equipment device is operative to display at least one indicator to denote previously viewed or unviewed content.

57. The system of item 56, wherein a user sets whether the indicator should denote previously viewed content, previously unviewed content, or both.

58. The system of item 56, wherein the user equipment device sets by default whether the indicator should denote previously viewed content previously unviewed content, or both.

59. The system of item 56, wherein the display comprises a first indicator to denote previously viewed content, and a second indicator to denote previously unviewed content.

60. The system of item 56, wherein the indicator comprises an icon, or a shading of the previously viewed or unviewed content.

61. The system of item 56, wherein the indicator indicates the last time the previously viewed content was viewed, the number of times the previously viewed content was viewed, how often the previously viewed content was viewed, or how much of the previously viewed content was viewed.

62. The system of item 56, wherein the indicator is displayed with an advertisement in a panel display.

63. The system of item 56, wherein the indicator is displayed with an advertisement to denote that the advertisement has been previously viewed or not viewed.

64. The system of item 56, wherein the indicator is displayed with an advertisement for an advertised program to denote that the advertised program has been previously viewed or not viewed.

65. The system of item 56, wherein the indicator is displayed with a program listing for a particular program to denote that the particular program has been previously viewed or not viewed.

66. The system of item 56, wherein the indicator is displayed in a picture-in-guide display to denote that content displayed in the picture-in-guide display has been previously viewed or not viewed.

67. The system of item 66, wherein the content displayed in the picture-in-guide display corresponds to an advertisement, a preview for a program, or a program.

68. The system of item 40, wherein the user equipment device is operative to display interactive content that does not include the previously viewed content.

69. The system of item 40, wherein the user equipment device is operative to display previously viewed content according to a rank within a display of interactive content.

70. The system of item 40, wherein the viewing history of previously viewed content is defined by the interactive media guidance application.

71. The system of item 40, wherein the viewing history of at least a portion of the previously viewed content is defined by a user on at least one of the plurality of user equipment devices.

72. The system of item 71, wherein the user enters the viewing history of the portion of the previously viewed content on an Internet website or on a display generated by the interactive media guidance application.



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73. The system of item 40, wherein the user equipment is operative to display a portion of the previously viewed content that has not yet been viewed.

74. The system of item 40, wherein at least one of the plurality of user equipment devices receives a user input to display interactive content based on the viewing history.

75. The system of item 40, wherein at least one of the plurality of user equipment devices receives a user input to display interactive content based only on a portion of the previously viewed content in the viewing history.

76. The system of item 40, wherein at least one of the plurality of user equipment devices receives a user input to display interactive content for only a portion of the functionality based on the viewing history.

77. The system of item 40, wherein at least one of the plurality of user equipment devices receives a user input to stop display of interactive content based on the viewing history.

78. The system of item 40, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

79. A method for using an interactive media guidance application, comprising:

providing a plurality of user equipment devices each capable of supporting an interactive media guidance application and that are communicatively coupled to each other via a home network;
determining the identity of a user using one of the.user devices;
providing a viewing history of the identified user, the viewing history including monitored interactions by the identified user on all of the user devices; and
generating interactive content based on the viewing history of the identified user for display using any user device communicatively coupled to the home network.

80. The method of item 79, further comprising displaying the generated interactive content on a display screen of a first one of the user devices for the identified user.

81. The method of item 79, further comprising displaying the generated interactive content on a display screen of a second one of the user devices for the identified user.

82. The method of item 79, wherein the determining comprises using an identification system to determine the identity of the identified user.

83. The method of item 79, wherein the determining comprises receiving a user input command that indicates the identity of the identified user.

84. The method of item 79, wherein the determining comprises selecting a default identity for the user.

85. The method of item 79, further comprising:

selecting a user profile for the identified user.

86. The method of item 85, wherein the selected user profile comprises the viewer history for the identified user.

87. The method of item 79, further comprising:

monitoring interactions performed by the identified user on all of the user devices; and
updating the viewer history for the identified user based on the monitored interactions.

88. The method of item 79, wherein the generated interactive content is accessible by each of the user devices.

89. The method of item 79, wherein the viewer history is accessible by each of the user devices.

90. The method of item 79, further comprising:

storing the viewer history on a database.

91. The method of item 90, wherein the database is located locally on one of the user devices.

92. The method of item 90, wherein the database is a home network database that is communicatively coupled to the home network.

93. The method of item 90, wherein the database is a remote database that is communicatively coupled to the home network.

94. The method of item 93, wherein the remote database is located on a server or a distribution facility.

95. The method of item 79, wherein the viewing history comprises data that indicates which programming has been viewed by the identified user, data that monitors the identified user's interactions with the interactive media guidance application, data that indicates which advertisements have been viewed or selected by the identified user, or data that indi-



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cates which additional information has been viewed or selected by the identified user.

96. The method of item 79, wherein the generated interactive content comprises a list of programming that has not been viewed by the identified user, advertisements that have not been viewed by the identified user, additional information that has not been viewed by the identified user, additional information that informs the identified user whether a particular program has been viewed, additional information that informs the identified user the last time a particular program was viewed, or a list of programming that has been ranked according to predetermined criteria.

97. The method of item 79, wherein the generated interactive content comprises a listing of programming, the method further comprising:

storing in a database an identifier associated with each program that has been viewed by the identified user; and
cross-referencing identifiers associated with all available programming with the identifiers stored in the database to determine which programming can be included in the listing of programming.

98. The method of item 79, wherein the generated interactive content comprises a listing of programming, the method further comprising:

providing a group of identifiers corresponding to all programming available that can be viewed for the identified user, wherein the listing of programming is derived from the group of identifiers; and

removing from the group identifiers corresponding to programming that has been viewed by the identified user.

99. The method of item 98, further comprising:

adding new identifiers to the group as new programming becomes available; and
deleting identifiers from the group when programming corresponding to the deleted identifiers is no longer available.

100. The method of item 79, wherein the identified user is a first user and the generated interactive content is first user generated interactive content, the method further comprising:

determining that a second user is using one of the user devices; and

generating second user interactive content based on a viewing history for the second user for display on a display screen of any user device communicatively coupled to the home network.

101. The method of item 79, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

102. A system for using an interactive media guidance application, comprising:

a plurality of user equipment devices communicatively coupled to each other via a home network, wherein at least one user equipment device is operative to:

determine the identity of a user;
provide a viewing history of the identified user, the viewing history including monitored interactions by the identified user on the plurality of user equipment devices; and
generate interactive content based on the viewing history of the identified user for display.

103. The system of item 102, wherein any one of the user equipment devices is operative to display the generated interactive content for the identified user.

104. The system of item 102, wherein the at least one user equipment device is operative to display the generated interactive content for the identified user.

105. The system of item 102, wherein the at least one user equipment device is operative to determine the identity of the identified user using an identification system.

106. The system of item, 102, wherein the at least one user equipment device is operative to receive a user input command that indicates the identity of the identified user.

107. The system of item 102, wherein the at least one user equipment device is operative to select a default identity for the user.

108. The system of item 102, wherein the at least one user equipment device is operative to:

select a user profile for the identified user.

109. The system of item 108, wherein the selected user profile comprises the viewer history for the identified user.



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110. The system of item 102, wherein the at least one user equipment device is operative to:

monitor interactions performed by the identified user on all of the user devices; and
update the viewer history for the identified user based on the monitored interactions.

111. The system of item 102, wherein the generated interactive content is accessible by each of the user equipment devices.

112. The system of item 102, wherein the viewer history is accessible by each of the user equipment devices.

113. The system of item 102, wherein the at least one user equipment device is operative to:

store the viewer history on a database.

114. The system of item 113, wherein the database is located locally on one of the user equipment devices.

115. The system of item 113, wherein the database is a home network database that is communicatively coupled to the home network.

116. The system of item 113, wherein the database is a remote database that is communicatively coupled to the home network.

117. The system of item 116, wherein the remote database is located on a server or a distribution facility.

118. The system of item 102, wherein the viewing history comprises data that indicates which programming has been viewed by the identified user, data that monitors the identified user's interactions with the user equipment devices, data that indicates which advertisements have been viewed or selected by the identified user, or data that indicates which additional information has been viewed or selected by the identified user.

119. The system of item 102, wherein the generated interactive content comprises a list of programming that has not been viewed by the identified user, advertisements that have not been viewed by the identified user, additional information that has not been viewed by the identified user, additional information that informs the identified user whether a particular program has been viewed, additional information that informs the identified user the last time a particular program was viewed, or a list of programming that has been ranked according to predetermined criteria.

120. The system of item 102, wherein the generated interactive content comprises a listing of programming, wherein the at least one user equipment device is operative to:

store in a database an identifier associated with each program that has been viewed by the identified user; and
cross-reference identifiers associated with all available programming with the identifiers stored in the database to determine which programming can be included in the listing of programming.

121. The system of item 102, wherein the generated interactive content comprises a listing of programming, wherein the at least one user equipment device is operative to:

provide a group of identifiers corresponding to all programming available that can be viewed for the identified user, wherein the listing of programming is derived from the group of identifiers; and
remove from the group identifiers corresponding to programming that has been viewed by the identified user.

122. The system of item 121, wherein the at least one user equipment device is operative to:

add new identifiers to the group as new programming becomes available; and
delete identifiers from the group when programming corresponding to the deleted identifiers is no longer available.

123. The system of item 102, wherein the identified user is a first user and the generated interactive content is first user generated interactive content, wherein the at least one user equipment device is operative to:

determine that a second user is using one of the user devices; and
generate second user interactive content based on a viewing history for the second user for display on a display screen of any user device communicatively coupled to the network.

124. The system of item 102, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

125. A method for using an interactive media guid-



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ance application, comprising:

providing a plurality of user equipment devices each capable of supporting an interactive media guidance application and that are communicatively coupled to each other via a home network;
providing a viewing history of a selected one of the user devices, the viewing history including monitored interactions that occurred at the selected user device; and
generating interactive content based on the viewing history of the selected user device for display on all of the user devices communicatively coupled to the home network.

126. The method of item 125, wherein the selected user device is a master device and all remaining user devices are slave devices that display generated interactive content based on the viewing history of the master device.

127. The method of item 125, further comprising displaying the generated interactive content on a display screen of any user device communicatively coupled to the home network.

128. The method of item 125, further comprising:

enabling a user to select which user device is the selected device.

129. The method of item 125, further comprising:

selecting a device profile for the selected device.

130. The method of item 129, wherein the selected user profile comprises the viewer history for the selected device.

131. The method of item 125, further comprising:

monitoring interactions performed on the selected user device; and
updating the viewer history for the selected device based on the monitored interactions.

132. The method of item 125, wherein the generated interactive content is accessible by each of the user devices.

133. The method of item 125, wherein the viewer history is accessible by each of the user devices.

134. The method of item 125, further comprising:

storing the viewer history on a database.

135. The method of item 134, wherein the database is located locally on one of the user devices.

136. The method of item 134, wherein the database is a home network database that is communicatively coupled to the home network.

137. The method of item 134, wherein the database is a remote database that is communicatively coupled to the home networks.

138. The method of item 137, wherein the remote database is located on a server or a distribution facility.

139. The method of item 125, wherein the viewing history comprises data that indicates which programming has been viewed on the selected user device, data that monitors interactions with the interactive media guidance application on the selected user device, data that indicates which advertisements have been displayed on a display screen of the selected user device, or data that indicates which additional information has been displayed on a display screen of the selected user device.

140. The method of item 125, wherein the generated interactive content comprises a list of programming that includes programming that has not been displayed on a display screen of the selected user device, advertisements that have not been displayed on a display screen of the selected user device, additional information that has not been displayed on a display screen of the selected user device, additional information that indicates whether a particular program has been viewed, additional information that indicates the last time a particular program was viewed, or a list of programming that has been ranked according to predetermined criteria.

141. The method of item 125, wherein the generated interactive content comprises a listing of programming, the method further comprising:

storing in a database an identifier associated with each program that has been viewed by the selected user device; and
cross-referencing identifiers associated with all available programming with the identifiers stored in the database to determine which programming can be included in the listing of programming.

142. The method of item 125, wherein the generated interactive content comprises a listing of programming, the method further comprising:

providing a group of identifiers corresponding to all programming available that can be viewed



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on any of the user devices communicatively coupled to the home network, wherein the listing of programming is derived from the group of identifiers; and
removing from the group identifiers corresponding to programming that has been viewed on the selected user device.

143. The method of item 142, further comprising:

adding new identifiers to the group as new programming becomes available; and
deleting identifiers from the group when programming corresponding to the deleted identifiers is no longer available.

144. The method of item 125, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

145. A system for using an interactive media guidance application, comprising:

a plurality of user equipment devices communicatively coupled to each other via a home network, wherein the system is operative to:

provide a viewing history of a selected one of the plurality of user equipment devices, the viewing history including monitored interactions that occurred at the selected user equipment device; and
generate interactive content based on the viewing history of the selected user equipment device for display.

146. The system of item 145, wherein the selected user device is a master device and all remaining user devices are slave devices that display generated interactive content based on the viewing history of the master device.

147. The system of item 145, wherein the at least one user equipment device is operative to display the generated interactive content.

148. The system of item 145, wherein the system is operative to:

enable a user to select which user device is the selected device.

149. The system of item 145, wherein the system is operative to:

select a device profile for the selected device.

150. The system of item 149, wherein the selected user profile comprises the viewer history for the selected device.

151. The system of item 145, wherein the system is operative to:

monitor interactions performed on the selected user device; and
update the viewer history for the selected device based on the monitored interactions.

152. The system of item 145, wherein the generated interactive content is accessible by each of the user devices.

153. The system of item 145, wherein the viewer history is accessible by each of the user devices.

154. The system of item 145, wherein the system is operative to:

store the viewer history on a database.

155. The system of item 154, wherein the database is located locally on one of the user devices.

156. The system of item 154, wherein the database is a network database that is communicatively coupled to the network.

157. The system of item 154, wherein the database is a remote database that is communicatively coupled to the network.

158. The system of item 157, wherein the remote database is located on a server or a distribution facility.

159. The system of item. 145, wherein the viewing history comprises data that indicates which programming has been viewed on the selected user device, data that monitors interactions on the selected user device, data that indicates which advertisements have been displayed by the selected user device, or data that indicates which additional information has been displayed by the selected user device.

160. The system of item 145, wherein the generated interactive content comprises a list of programming that includes programming that has not been displayed by the selected user device, advertisements that have not been displayed by the selected user device, additional information that has not been displayed by the selected user device, additional information that indicates whether a particular program has been viewed, additional information that indicates the last time a particular program was viewed,



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or a list of programming that has been ranked according to predetermined criteria.

161. The system of item 145, wherein the generated interactive content comprises a listing of programming, wherein the system is operative to:

store in a database an identifier associated with each program that has been viewed by the selected user device; and
cross-reference identifiers associated with all available programming with the identifiers stored in the database to determine which programming can be included in the listing of programming.

162. The system of item 145, wherein the generated interactive content comprises a listing of programming, wherein the system is operative to:

provide a group of identifiers corresponding to all programming available that can be viewed on any of the user devices communicatively coupled to the network, wherein the listing of programming is derived from the group of identifiers; and

remove from the group identifiers corresponding to programming that has been viewed on the selected user device.

163. The system of item 162, wherein the system is operative to:

add new identifiers to the group as new programming becomes available; and
delete identifiers from the group when programming corresponding to the deleted identifiers is no longer available.

164. The system of item 145, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

165. A method for using an interactive media guidance application, comprising:

providing at least two home networks that are communicatively coupled to each other, each home network comprising at least one user equipment device capable of supporting an interactive media guidance application;
providing a viewing history for at least a first of the home networks, the viewing history including monitored interactions that occurred at the first home network; and
generating interactive content based on the viewing history for the first home network.

166. The method of item 165, further comprising:

displaying the generated interactive content on a display device of at least one user device of at least one of the home networks.

167. The method of item 165, further comprising:

displaying the generated interactive content on at least one display device of a second of the home networks.

168. The method of item 165, further comprising:

displaying the generated interactive content on at least one display device of the first of the home networks.

169. The method of item, 165, wherein the generated interactive content is accessible by each of the home networks.

170. The method of item 165, wherein the viewing history of the first of the home networks is accessible by each of the home networks.

171. The method of item 165, further comprising:

providing a home profile, wherein the home profile comprises the viewer history for at least the first of the home networks.

172. The method of item 165, further comprising:

monitoring interactions performed on the first of the home networks; and
updating the viewer history for at least the first of the home networks based on the monitored interactions.

173. The method of item 165, wherein the viewer history is associated with the first of the home networks and a second of the home networks, the method further comprising:

monitoring interactions performed on a second of the home networks; and
updating the viewer history for the first and second of the home networks.

174. The method of item 165, further comprising:

storing the viewer history on a database.

175. The method of item 174, wherein the database is located locally on a user device that is communi-



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catively coupled to one of the home networks.

176. The method of item 174, wherein the database is a home network database that is communicatively coupled to one of the home networks.

177. The method of item 174, wherein the database is a remote database that is communicatively coupled to each of the home networks.

178. The method of item 177, wherein the remote database is located on a server or a distribution facility.

179. The method of item 165, wherein the viewing history comprises data that indicates which programming has been viewed on the first of the home networks, data that monitors interactions with the interactive media guidance application on the first of the home networks, data that indicates which advertisements have been displayed on the first of the home networks, or data that indicates which additional information has been displayed on the first of the home networks.

180. The method of item 165, wherein the generated interactive content comprises a list of programming that includes programming that has not been displayed on the first of the home networks, advertisements that have not been displayed on the first of the home networks, additional information that has not been displayed on the first of the home networks, additional information that indicates whether a particular program has been viewed, additional information that indicates the last time a particular program was viewed, or a list of programming that has been ranked according to predetermined criteria.

181. The method of item 165, wherein the generated interactive content comprises a listing of programming, the method further comprising:

storing in a database an identifier associated with each program that has been viewed on the first of the home networks; and
cross-referencing identifiers associated with all available programming with the identifiers stored in the database to determine which programming can be included in the listing of programming.

182. The method of item 165, wherein the generated interactive content comprises a listing of programming, the method further comprising:

providing a group of identifiers corresponding to all programming available that can be viewed at any of the home networks, wherein the listing of programming is derived from the group of identifiers; and
removing from the group identifiers corresponding to programming that has been viewed on the first of the home networks.

183. The method of item 182, further comprising:

adding new identifiers to the group as new programming becomes available; and
deleting identifiers from the group when programming corresponding to the deleted identifiers is no longer available.

184. The method of item 165, wherein the interactive media guidance application is an interactive television program guide or an online television program guide.

185. A system for using an interactive media guidance application, comprising:

at least two home networks that are communicatively coupled to each other, each home network comprising at least one user equipment device, wherein the system is operative to:

provide a viewing history for at least a first of the home networks, the viewing history including monitored interactions that occurred at the first home network; and
generate interactive content based on the viewing history for the first home network.

186. The system of item 185, wherein the system is operative to:

display the generated interactive content on a display device of at least one user equipment device of at least one of the home networks.

187. The system of item 185, wherein the system is operative to:

display the generated interactive content on at least one display device of a second of the home networks.

188. The system of item 185, wherein the system is operative to:

display the generated interactive content on at least one display device of the first of the home networks.

189. The system of item 185, wherein the generated interactive content is accessible by each of the home networks.



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