



- (51) International Patent Classification:  
*G06F 17/28* (2006.01) *G06Q 50/30* (2012.01)
- (21) International Application Number:  
PCT/US2012/031722
- (22) International Filing Date:  
30 March 2012 (30.03.2012)
- (25) Filing Language:  
English
- (26) Publication Language:  
English
- (30) Priority Data:
 

13/076,862	31 March 2011 (31.03.2011)	US
13/077,233	31 March 2011 (31.03.2011)	US
13/077,303	31 March 2011 (31.03.2011)	US
13/077,368	31 March 2011 (31.03.2011)	US
13/077,396	31 March 2011 (31.03.2011)	US
13/077,431	31 March 2011 (31.03.2011)	US
13/077,455	31 March 2011 (31.03.2011)	US

Redmond, Washington 98052-6399 (US). **CHINTHAKUNTA, Madhusudan**; c/o Microsoft Corporation, LCA - International Patents, One Microsoft Way, Redmond, Washington 98052-6399 (US). **MITBY, David**; c/o Microsoft Corporation, LCA - International Patents, One Microsoft Way, Redmond, Washington 98052-6399 (US). **STIFELMAN, Lisa**; c/o Microsoft Corporation, LCA - International Patents, One Microsoft Way, Redmond, Washington 98052-6399 (US).

- (71) Applicant (for all designated States except US): **MICROSOFT CORPORATION** [US/US]; One Microsoft Way, Redmond, Washington 98052-6399 (US).
- (72) Inventors: **HECK, Larry Paul**; c/o Microsoft Corporation, LCA - International Patents, One Microsoft Way,

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LR, LS, MW, MZ, NA, RW, SD, SL, SZ, TZ,

[Continued on next page]

(54) Title: AUGMENTED CONVERSATIONAL UNDERSTANDING AGENT

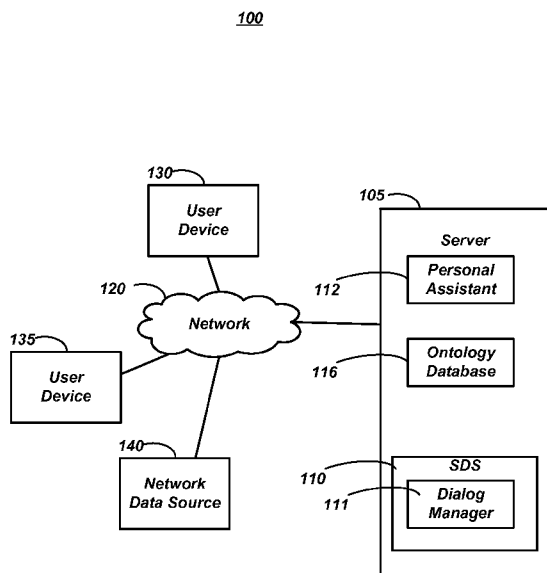


FIG. 1

(57) Abstract: An augmented conversational understanding agent may be provided. Upon receiving, by an agent, at least one natural language phrase from a user, a context associated with the at least one natural language phrase may be identified. The natural language phrase may be associated, for example, with a conversation between the user and a second user. An agent action associated with the identified context may be performed according to the at least one natural language phrase and a result associated with performing the action may be displayed.

WO 2012/135783 A3



UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV, MC, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

**Published:**

- *with international search report (Art. 21(3))*
- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments (Rule 48.2(h))*

**Declarations under Rule 4.17:**

- *as to applicant's entitlement to apply for and be granted a patent (Rule 4.17(ii))*
- *as to the applicant's entitlement to claim the priority of the earlier application (Rule 4.17(iii))*

**(88) Date of publication of the international search report:**

27 December 2012

## INTERNATIONAL SEARCH REPORT

International application No.  
**PCT/US2012/031722****A. CLASSIFICATION OF SUBJECT MATTER****G06F 17/28(2006.01)i, G06Q 50/30(2012.01)i**

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)

G06F 17/28; G06F 15/16; G06Q 30/00; G06F 17/27; G10L 15/18

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Korean utility models and applications for utility models  
Japanese utility models and applications for utility models

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

eKOMPASS(KIPO internal) &amp; Keywords:conversation(dialog), message, phrase, context, agent

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 2008-0201434 A1 (HOLMES JOHN S. et al.) 21 August 2008 See paragraph 14; paragraph 28 - paragraph 31; paragraph 44 - paragraph 46; paragraph 57 - paragraph 64;	1-4,6,9
A	claims 1,5-6, and figures 3-4,8-9.	5,7-8,10
Y	US 2007-0038436 A1 (CRISTO, PHILIPPE DI et al.) 15 February 2007 See paragraph 100 - paragraph 108; paragraph 119 - paragraph 122;	1-4,6,9
A	paragraph 215 - paragraph 217; claims 1,12, and figures 2,3,8.	5,7-8,10
A	US 2009-0076917 A1 (JABLOKOV VICTOR RODITIS et al.) 19 March 2009 See paragraph 255 - paragraph 267; claims 1,5,7, and figures 5-9.	1-10
A	US 2010-0057463 A1 (WENG FULIANG et al.) 04 March 2010 See paragraph 17 - paragraph 19; paragraph 28 - paragraph 29; claim 1, and figures 1-3.	1-10

 Further documents are listed in the continuation of Box C. See patent family annex.

\* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier application or patent but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art

"&amp;" document member of the same patent family

Date of the actual completion of the international search

23 OCTOBER 2012 (23.10.2012)

Date of mailing of the international search report

**23 OCTOBER 2012 (23.10.2012)**

Name and mailing address of the ISA/KR

Korean Intellectual Property Office  
189 Cheongsa-ro, Seo-gu, Daejeon Metropolitan  
City, 302-701, Republic of Korea

Facsimile No. 82-42-472-7140

Authorized officer

PARK, SANG HYUN

Telephone No. 82-42-481-8263



**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International application No.

**PCT/US2012/031722**

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
US 2008-0201434 A1	21.08.2008	AU 2008-216571 A1 CA 2676226 A1 CN 101611398 A EP 2143010 A1 EP 2143010 A4 IL 199932 D0 JP 2010-519609 A KR 10-2009-0115790 A MX 2009008765 A TW 200839551 A WO 2008-100690 A1 ZA 200905014A	21.08.2008 21.08.2008 23.12.2009 13.01.2010 21.12.2011 15.04.2010 03.06.2010 06.11.2009 25.08.2009 01.10.2008 21.08.2008 29.09.2010
US 2007-0038436 A1	15.02.2007	US 2010-0023320 A1 US 2011-0131036 A1 US 7620549 B2 WO 2007-021587 A2 WO 2007-021587 A3	28.01.2010 02.06.2011 17.11.2009 22.02.2007 27.09.2007
US 2009-0076917 A1	19.03.2009	None	
US 2010-0057463 A1	04.03.2010	CN 102165518 A EP 2329490 A1 WO 2010-027561 A1	24.08.2011 08.06.2011 11.03.2010