

EXHIBIT A

(12) **United States Patent**
O'Sullivan et al.

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(54) **CONTENT AND CONTEXT BASED
HANDLING OF INSTANT MESSAGES**

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U.S.C. 154(b) by 2487 days.

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G06N 5/00 (2006.01)
G06F 1/00 (2006.01)
G06F 17/21 (2006.01)
H04L 12/58 (2006.01)

(52) **U.S. Cl.**
CPC **G06F 17/211** (2013.01); **H04L 12/581**
(2013.01); **H04L 51/04** (2013.01)

(58) **Field of Classification Search**
USPC 706/48; 709/224; 726/1
See application file for complete search history.

(56) **References Cited**

U.S. PATENT DOCUMENTS

7,827,561 B2 * 11/2010 McKee et al. 719/313
2004/0201623 A1 10/2004 Hamilton, II et al.
2004/0205161 A1 10/2004 Hamilton, II et al.
2004/0215730 A1 10/2004 Hamilton, II et al.
2005/0132011 A1 6/2005 Muller et al.

2006/0168048 A1 7/2006 Lyle et al.
2006/0227943 A1 10/2006 Yan
2006/0248150 A1 11/2006 Chaar et al.
2007/0156832 A1 7/2007 Daniels-Farrar et al.
2009/0063639 A1 * 3/2009 Lingafelt et al. 709/206
2009/0089417 A1 * 4/2009 Giffin et al. 709/224
2009/0100497 A1 * 4/2009 Goldberg et al. 726/1

OTHER PUBLICATIONS

Matt Hines, CNET News.com, IM status: More worms on the way,
Mar. 23, 2005, pp. 1-3, <http://www.zdnetasia.com/news/security/0,39044215,39222828,00.htm>.

Carroll Communications Inc., Solutions That Work, 2008, pp. 1-2,
<http://www.carrollcommunications.com/ipoffice/5donotdisturb.html>.

South Central Rural Telephone Company, Do Not Disturb Services,
2006, pp. 1-2, <http://www.scrtc.com/donotdisturbservice.html>.

(Continued)

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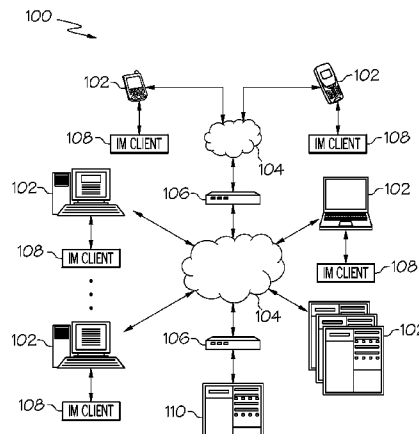
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(57) **ABSTRACT**

Instant message systems are enhanced by establishing at least one handling rule that is evaluated in an instant messaging environment, each established handling rule defining a condition based upon at least one of identified content or identified context, and a corresponding event handling action to be performed within the instant message environment. Upon identifying an instant message conversation within the instant message environment between a user and a correspondent, each handling rule is evaluated and the event handling action of an associated handling rule is performed if it is determined that the condition of handling rule is satisfied. Further, an indication that the corresponding event action was performed is conveyed to a corresponding user.

2 Claims, 7 Drawing Sheets



(56)

References Cited

OTHER PUBLICATIONS

Ecma International, Standard ECMA-193, Private Integrated Services Network (PISN)—Specification, Functional Model and Information Flows—Do Not Disturb and Do Not Disturb Override

Supplementary Services (DND(O)SD), 2nd edition (Jun. 1997), 1 pg., <http://www.ecma/-international.org/flat/publications/Standards/ecma-193.htm>.

* cited by examiner

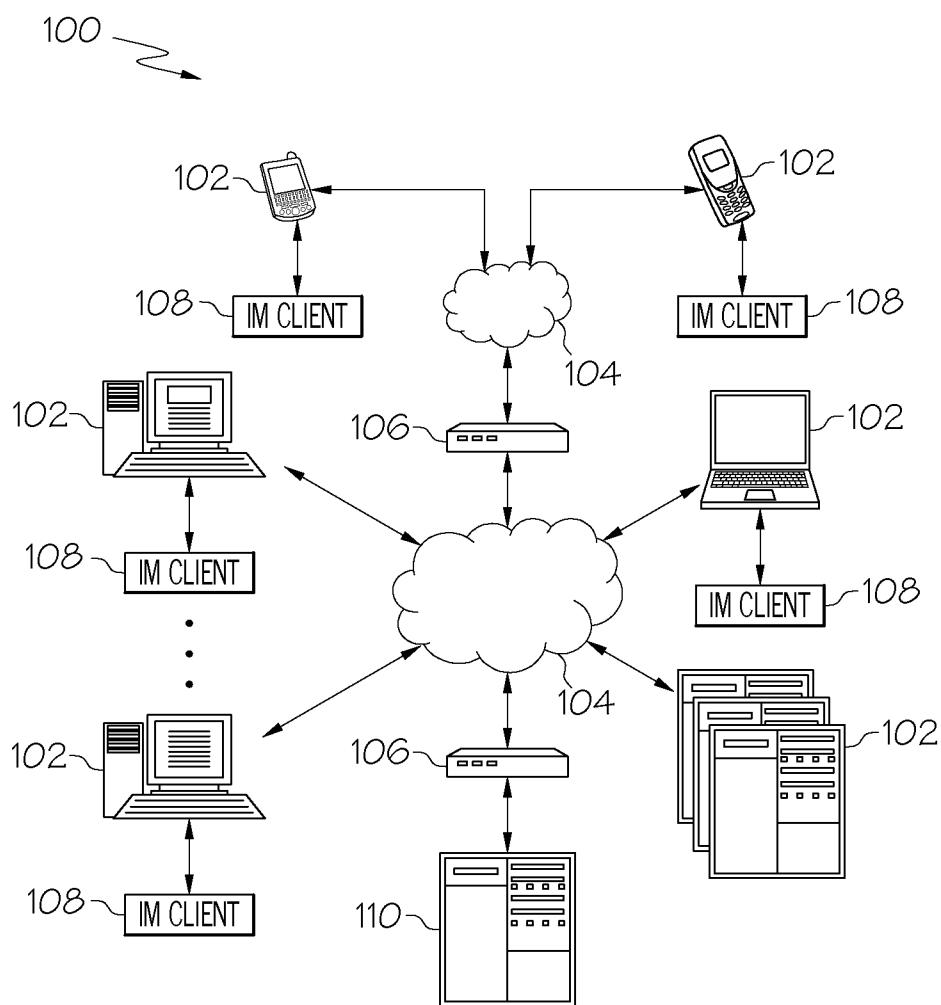


FIG. 1

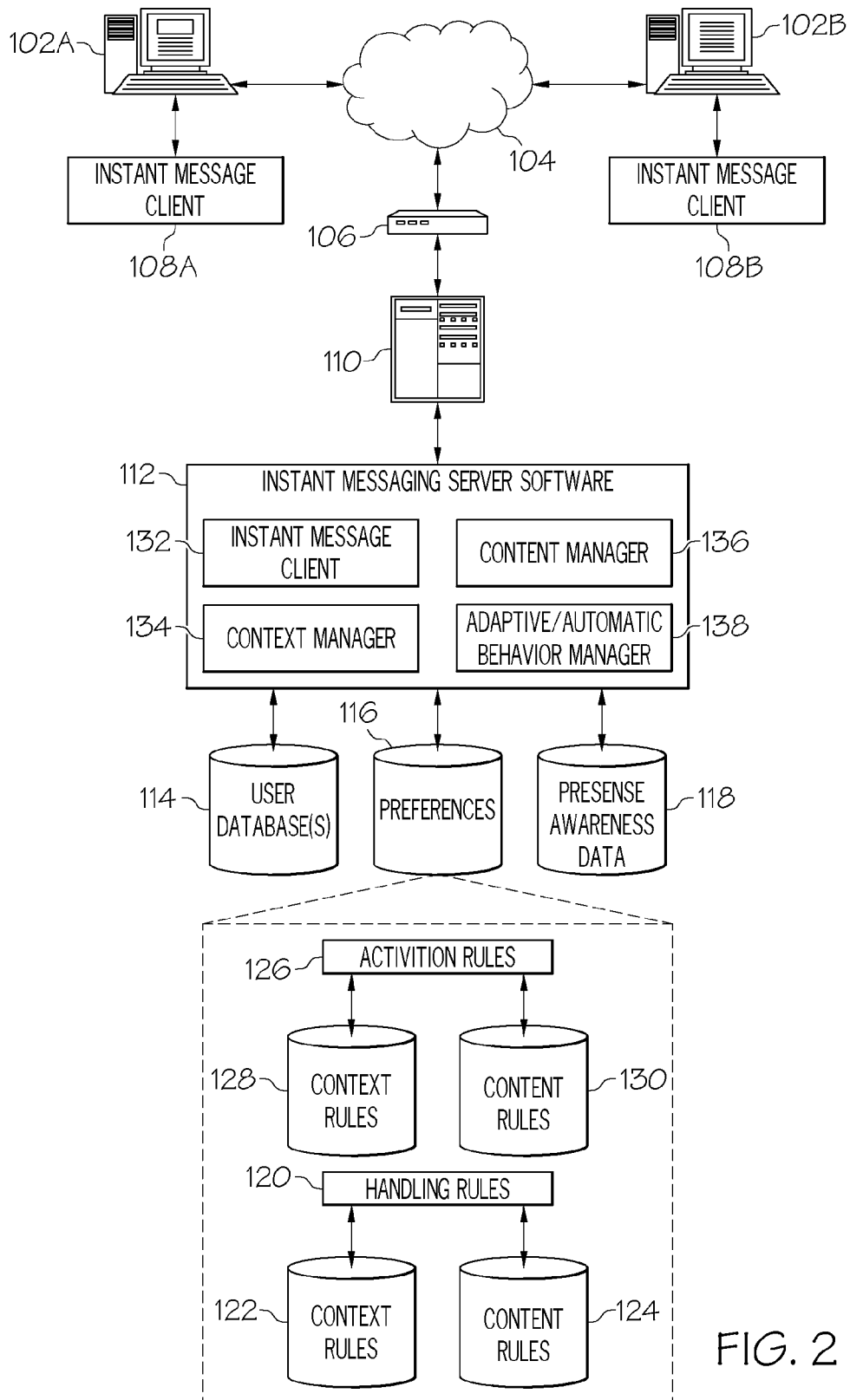


FIG. 2

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