

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
23 March 2006 (23.03.2006)

PCT

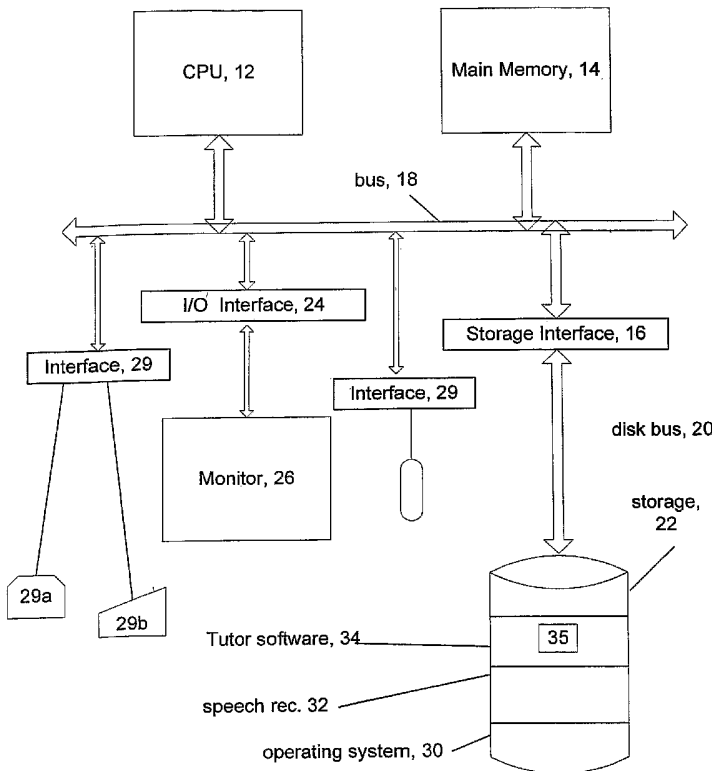
(10) International Publication Number
WO 2006/031752 A3

- (51) International Patent Classification:
G10L 11/02 (2006.01) G10L 21/02 (2006.01)
G10L 15/20 (2006.01)
- (21) International Application Number:
PCT/US2005/032452
- (22) International Filing Date:
9 September 2005 (09.09.2005)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data:
10/939,167 10 September 2004 (10.09.2004) US
- (71) Applicant (for all designated States except US): SOLIL-
OQUY LEARNING, INC. [US/US]; 144 Gould Street,
Suite 202, Needham, MA 02494 (US).
- (72) Inventors; and
- (75) Inventors/Applicants (for US only): BARKER, Simon
[GB/US]; 108 Harden Avenue, Watertown, MA 02472
(US). WOLF, Jared, J. [US/US]; 3 Hilltop Drive, Bed-
ford, MA 01730 (US).

- (74) Agent: MALONEY, Denis, G.; Fish & Richardson P.C.,
P.O. Box 1022, Minneapolis, MN 55440-1022 (US).
- (81) Designated States (unless otherwise indicated, for every
kind of national protection available): AE, AG, AL, AM,
AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN,
CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI,
GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE,
KG, KM, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA,
MD, MG, MK, MN, MW, MX, MZ, NA, NG, NI, NO, NZ,
OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL,
SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC,
VN, YU, ZA, ZM, ZW.
- (84) Designated States (unless otherwise indicated, for every
kind of regional protection available): ARIPO (BW, GH,
GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM,
ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),
European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI,
FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT,
RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA,
GN, GQ, GW, ML, MR, NE, SN, TD, TG).

[Continued on next page]

(54) Title: MICROPHONE SETUP AND TESTING IN VOICE RECOGNITION SOFTWARE



(57) Abstract: Systems, devices, and methods for performing a microphone test routine (35) are disclosed during an initial setup of a speech recognition program (32) and at a predetermined time intervals during use of the speech recognition program (32) to detect recognition errors associated with the microphone (29b).

WO 2006/031752 A3



Published:

- *with international search report*
- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments*

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

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

19 October 2006

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US05/32452

A. CLASSIFICATION OF SUBJECT MATTER

IPC: **G10L 11/02, 15/20, 21/02**

USPC: 704/226, 227, 228, 231, 233

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)
U.S. : 704/226, 227, 228, 231, 233

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

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

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 5,949,886 A (NEVINS et al) 07 September 1999 (07.09.1999), column 1, lines 29 to 41; column 2, lines 29 to 38; column 4, lines 23 to 35; column 1, line 66 to column 2, line 10; column 2, lines 38 to 45; column 3, lines 21 to 52; column 4, lines 45 to 59; column 5, lines 18 to 35; column 5, lines 43 to 53; column 5, lines 1 to 17; column 5, lines 54 to 63.	1, 4-8, 21-22, 25, 30, 33, 37
A	US 6,324,499 B1 (LEWIS et al) 27 November 2001 (27.22.2001), column 1, lines 20 to 36.	2-3, 9-20, 23-24, 26-29, 31-32, 34-36
A	US 5,822,718 A (BAKIS et al) 13 October 1998 (13.10.1998), column 1, lines 5 to 67.	1-37
A	US 6,266,571 B1 (FADO et al) 24 July 2001 (24.07.2001), column 1, line 26 to column 2, line 33.	1-37
A	US 6,731,993 B1 (CARTER et al) 04 May 2004 (04.05.2004), column 2, lines 15 to 37.	1-37

Further documents are listed in the continuation of Box C.

See patent family annex.

* Special categories of cited documents:	"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
"A" document defining the general state of the art which is not considered to be of particular relevance	"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
"E" earlier application or patent published on or after the international filing date	"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
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)	"&" document member of the same patent family
"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	

Date of the actual completion of the international search

22 February 2006 (22.02.2006)

Date of mailing of the international search report

29 AUG 2006

Name and mailing address of the ISA/US

Mail Stop PCT, Attn: ISA/US
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

Facsimile No. (571) 273-3201

Authorized officer

Martin Lerner

Telephone No. (571) 272-4550

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US05/32452

Continuation of B. FIELDS SEARCHED Item 3:

EAST: search terms: test near3 microphone; and speech adj recognition; and hum; and signal adj noise adj ratio; and breath\$; and a.c.;
and ac