## ${\bf (19) \ World \ Intellectual \ Property \ Organization}$

International Bureau





# (43) International Publication Date 10 October 2002 (10.10.2002)

#### **PCT**

# (10) International Publication Number WO 02/080486 A3

(51) International Patent Classification?: H04B 7/185, H04L 12/58

(21) International Application Number: PCT/US02/10376

(22) International Filing Date: 29 March 2002 (29.03.2002)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:

60/280,334 29 March 2001 (29.03.2001) US 60/280,311 29 March 2001 (29.03.2001) US Not furnished 28 March 2002 (28.03.2002) US

- (71) Applicant (for all designated States except US): TENZ-ING COMMUNICATIONS, INC. [US/US]; 700 5th Avenue, 38th Floor, Seattle, WA 98104 (US).
- (72) Inventors; and
- (75) Inventors/Applicants (for US only): GRESHAM, Simon, I. [AU/US]; 1017 East Republican Street, Seattle, WA 98102 (US). MOORE, Nathanael, E. [US/US]; 3405 South 381st Court, Auburn, WA 98001 (US). LEMME, Peter, W. [US/US]; 11233 N.E. 94th Street, Kirkland, WA 98033 (US).

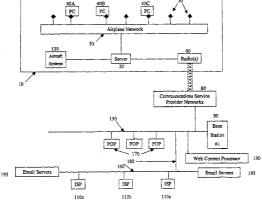
- (74) Agents: DONOHUE, Michael, J. et al.; Davis Wright Tremaine LLP, 2600 Century Square, 1501 Fourth Avenue, Seattle, WA 98101-1688 (US).
- (81) Designated States (national): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, VN, YU, ZA, ZM, ZW.
- (84) Designated States (regional): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

#### **Published:**

- with international search report
- (88) Date of publication of the international search report: 10 July 2003

[Continued on next page]

(54) Title: SYSTEM AND METHOD FOR AIRBORNE PASSENGER ELECTRONIC COMMUNICATION



(57) Abstract: An electronic communication system for use onboard an aircraft includes a server and a plurality of input ports for connection with passenger computing devices. Passengers can send and retrieve electronic messages (e-mail and/or attachments) using a proxy-based web server access to the user's own e-mail service provider. The system receives proxy-based commands from the user's computing device and translates those commands into web-based commands that enable communication with the passenger's e-mail accounts. The passenger may send e-mail communications by composing a message on the passenger computing device and sending it via the web-based proxy server. E-mail messages may also be retrieved from one or more passenger e-mail accounts. In one embodiment, the system transmits only e-mail summary information to the airborne server and provides the summary information to the passenger. The passenger may select one or more e-mails and/or attachments for subsequent retrieval, thus limiting passenger expense for retrieval of unwanted or unnecessary e-mails and/or attachments. The system may also display cost information associated with uploading the e-mail and/or attachments to enable the passenger to select those desired messages for subsequent transmission.



02/080486 A

# WO 02/080486 A3

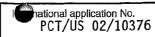
For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

Intermional Application No PC1/US 02/10376

A. CLASSIFICATION OF SUBJECT MATTER IPC 7 H04B7/185 H04L H04L12/58 According to International Patent Classification (IPC) or to both national classification and IPC Minimum documentation searched (classification system followed by classification symbols) IPC 7 H04B H04L 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 practical, search terms used) EPO-Internal, WPI Data, PAJ, INSPEC C. DOCUMENTS CONSIDERED TO BE RELEVANT Citation of document, with indication, where appropriate, of the relevant passages Relevant to claim No. WO 01 77877 A (HONEYWELL INT INC ; HOSFORD DAVID C (US); MEAD STEPHEN E (US)) P,X 1-13.24-29, 40-45, 18 October 2001 (2001-10-18) 52-57 abstract page 6, line 19 -page 7, line 12 page 8, line 24-30 page 10, line 29 -page 13, line 5 page 13, line 30 -page 14, line 10 figures claims Patent family members are listed in annex. Further documents are listed in the continuation of box C. X ° 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 "A" document defining the general state of the art which is not considered to be of particular relevance invention "E" earlier document but published on or after the international "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 filing date "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) "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. "O" document referring to an oral disclosure, use, exhibition or other means document published prior to the international filing date but later than the priority date claimed "&" document member of the same patent family Date of the actual completion of the international search Date of mailing of the international search report 1 0, 12, 2002 13 November 2002 Name and mailing address of the ISA Authorized officer European Patent Office, P.B. 5818 Patentlaan 2 NL – 2280 HV Rijswijk Tel. (+31–70) 340–2040, Tx. 31 651 epo nl, Dejonghe, 0 Fax: (+31-70) 340-3016

Intercional Application No PCT/US 02/10376

		PC1/US 02/103/6
<u> </u>	ation) DOCUMENTS CONSIDERED TO BE RELEVANT	Relevant to claim No.
Category °	Citation of document, with indication, where appropriate, of the relevant passages	Helevant to claim No.
X Y	WO 00 14987 A (GRESHAM SIMON ISAAC;BASTIAN FABIO (AU); TENZING INC (US); LEMME P) 16 March 2000 (2000-03-16) cited in the application abstract	1-13, 24-29, 40-45, 52-57 30,31, 33-39, 58,59,
A	page 4, line 1-20  page 5, line 13 -page 7, line 9 page 10, line 12-22 page 12, line 11 -page 13, line 7 page 27, line 3 -page 30, line 23 claims	61-65 14-23, 32, 46-51,60
Y A	WO 99 23807 A (MELITA INTERNATIONAL CORP) 14 May 1999 (1999-05-14) abstract	30,31, 33-39, 58,59, 61-65 14-23, 32,
	page 2, line 20 -page 3, line 15 page 5, line 21-31 page 13, line 4 -page 14, line 36 page 31, line 15 -page 33, line 2	46-51,60
A	US 5 974 444 A (KONRAD ALLAN M) 26 October 1999 (1999-10-26)  abstract column 10, line 27 -column 11, line 4	14-23, 30-39, 46-51, 58-65



Box I	Observations where certain claims were found unsearchable (Continuation of item 1 of first sheet)					
This International Search Report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:						
1.	Claims Nos.: because they relate to subject matter not required to be searched by this Authority, namely:					
	Claims Nos.: because they relate to parts of the International Application that do not comply with the prescribed requirements to such an extent that no meaningful International Search can be carried out, specifically:					
	Claims Nos.: because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).					
Box II	Observations where unity of invention is lacking (Continuation of item 2 of first sheet)					
This Inte	rnational Searching Authority found multiple inventions in this international application, as follows:					
	see additional sheet					
1. X	As all required additional search fees were timely paid by the applicant, this International Search Report covers all searchable claims.					
2.	As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.					
	As only some of the required additional search fees were timely paid by the applicant, this International Search Report covers only those claims for which fees were paid, specifically claims Nos.:					
	No required additional search fees were timely paid by the applicant. Consequently, this International Search Report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:					
Remark	on Protest  The additional search fees were accompanied by the applicant's protest.  X  No protest accompanied the payment of additional search fees.					

### FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

This International Searching Authority found multiple (groups of) inventions in this international application, as follows:

1. Claims: 1-13,24-29,40-45,52-57

wireless electronic messaging system, method and computer-readable media for use in an aircraft to allow the end-user to select which messages or part of messages he wishes to receive aboard the aircraft

2. Claims: 14-23,30-39,46-51,58-65

wireless electronic messaging system and method for use in aircraft in which airborne mail commands are converted to e-mail commands to allow the passenger to access transparently to his e-mail account

crmation on patent family members

Interpenal Application No PC1/US 02/10376

Patent document cited in search report		Publication date	Patent family member(s)		Publication date
WO 0177877	A	18-10-2001	AU WO US	5336401 A 0177877 A2 2001036822 A1	
WO 0014987	Α	16-03-2000	AU WO EP	6069499 A 0014987 A1 1108340 A1	
WO 9923807	A	14-05-1999	US AU CA EP WO	6359892 B1 1293199 A 2308157 A1 1031231 A1 9923807 A1	24-05-1999 14-05-1999 30-08-2000
US 5974444	Α	26-10-1999	US US	5696901 A 5544320 A	09-12-1997 06-08-1996