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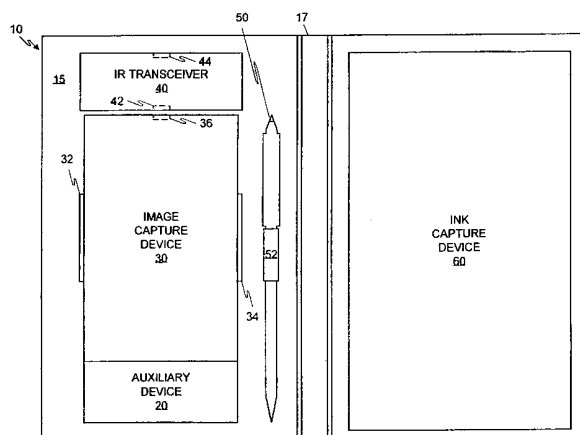
(84) Designated States (*regional*): ARIPO patent (GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG).

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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.

(54) Title: APPARATUS AND METHOD FOR HANDWRITING CAPTURE



(57) Abstract: A handwriting capture system combines an image capture device (30, 504, 604, 906, 1004, 1106, 1304) such as a PDA, notebook computer, set top box, smart television, or other type of smart appliance having an image capture capability and a built-in wireless transceiver (36, 506, 606, 1306), with an ink capture device (60, 210, 904, 1312) such as, for example, a digital notepad using, for example, electromagnetic, resistivity, or laser digitizing technology and presenting a suitable writing surface such as, for example, a paper writing surface for conventional ink. Communications between the ink capture device and the image capture device is achieved with wireless technology. For image capture devices such as PDAs and notebook computers having built-in infrared ports and designed for personal use, a portfolio (15, 502, 602, 802, 902, 1002, 1102, 1202, 1308) and the image capture device is achieved with wireless technology. The image capture device is mounted on the portfolio with retainer clips (32, 34) or by any other releasable mounting technique so that it may be easily removed and used separately. The image of what is written on the sheet of paper is automatically and seamlessly acquired electronically by the digital image capture device.



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INTERNATIONAL SEARCH REPORT

International Application No

PCT/US 00/10648

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 G06K11/06 G06F3/033 H04B10/00 G06F1/16

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)

IPC 7 G06K G06F H04B

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

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 5 049 862 A (DAO JAMES ET AL) 17 September 1991 (1991-09-17) column 3, line 64 -column 6, line 7 column 7, line 42 -column 11, line 17 figures 1,6A,8A-8D	1-5, 10-17, 33-35, 39-44
Y	---	32,36-38
X	EP 0 615 209 A (TOKYO SHIBAURA ELECTRIC CO) 14 September 1994 (1994-09-14) figures 5,6 column 11, line 17 -column 13, line 31 ---	1,2,4, 34,35
A	US 5 587 560 A (CROOKS JOHN F ET AL) 24 December 1996 (1996-12-24) column 3, line 41 - line 50; figure 5 --- -/--	5

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in 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 document 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 another 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.

"&" document member of the same patent family

Date of the actual completion of the international search

27 October 2000

Date of mailing of the international search report

17. 11. 00

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INTERNATIONAL SEARCH REPORT

International Application No

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 5 105 338 A (HELD MICHAEL E) 14 April 1992 (1992-04-14) column 2, line 36 -column 3, line 3; figures 1,7 ---	6,18,23, 25
A	US 5 241 303 A (GROOVER III ROBERT ET AL) 31 August 1993 (1993-08-31) column 6, line 51 -column 8, line 43; figures 1A-3C ---	9,28
Y	EP 0 618 715 A (ACE DENKEN KK) 5 October 1994 (1994-10-05) column 4, line 29 -column 5, line 6; figure 2 ---	32
Y	EP 0 641 095 A (CANON KK) 1 March 1995 (1995-03-01) column 8, line 34 -column 10, line 11; figures 4,5 -----	36-38

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US 00/10648

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:
2. ☐ 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:
3. ☐ 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 International Searching Authority found multiple inventions in this international application, as follows:

see additional sheet

1. ☒ 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.
3. ☐ 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.:
4. ☐ 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.

☒ 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: 1-8,10-17,33-35,39-44

Spine comprising hinges and a battery compartment

2. Claims: 9-17,28-30

A stand for providing clearance over a keyboard

3. Claims: 18-27,31,33

A mounting arrangement in a portfolio for enabling wireless infrared communication

4. Claim : 32

A third panel having a display screen

5. Claims: 36-38

Power management for wireless transceivers

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/US 00/10648

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
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