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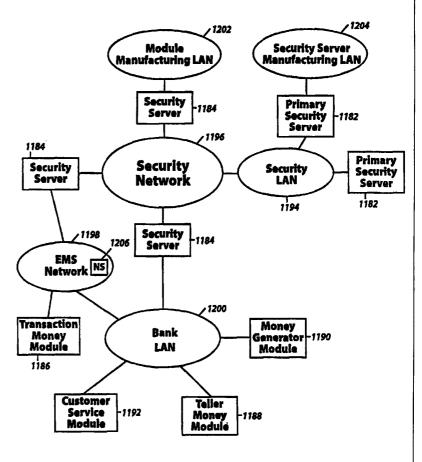
Before the expiration of the time limit for amending the claims and to be republished in the event of the receipt of amendments.

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(54) Title: ELECTRONIC-MONETARY SYSTEM

(57) Abstract

An electronic-monetary system having (1) banks or financial institutions that are coupled to a money generator device for generating and issuing to subscribing customers electronic money including electronic currency backed by demand deposits and electronic credit authorizations; (2) correspondent banks that accept and distribute the electronic money; (3) a plurality of transaction devices that are used by subscribers for storing electronic money, for performing money transactions with the on-line systems of the participating banks or for exchanging electronic money with other like transaction devices in off-line transactions; (4) teller devices, associated with the issuing and correspondent banks, for process handling and interfacing the transaction devices to the issuing and correspondent banks, and for interfacing between the issuing and correspondent banks themselves; (5) a clearing bank for balancing the electronic money accounts of the different issuing banks; (6) a data communications network for providing communications services to all components of the system; and (7) a security arrangement for maintaining the integrity of the system, and for detecting counterfeiting and tampering within the system. An embodiment of the invention includes a customer service module which handles lost money claims and links accounts to money modules for providing bank access.



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A. CLASSIFICATION OF SUBJECT MATTER IPC 6 G07F7/08 G06F17/60 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) G07F G06F IPC 6 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) C. DOCUMENTS CONSIDERED TO BE RELEVANT Relevant to claim No. Citation of document, with indication, where appropriate, of the relevant passages Category 1-82 WO,A,93 10503 (CITIBANK) 27 May 1993 cited in the application see abstract; claims; figures WO,A,93 08545 (JONHIG) 29 April 1993 Χ 1,2,4,5, see abstract; claims; figures Α 15,28, 38,40, 42-45, 49,50 see page 11, line 8 - page 13, line 25 Patent family members are listed in annex. Further documents are listed in the continuation of box C. X | XÌ * 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 "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 filing date involve an inventive step when the document is taken alone "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 docudocument referring to an oral disclosure, use, exhibition or ments, such combination being obvious to a person skilled in the art. 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 31. 10. 96 26 September 1996 Authorized officer Name and mailing address of the ISA European Patent Office, P.B. 5818 Patentiaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Tx. 31 651 epo nl, David, J Fax: (+31-70) 340-3016

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		PCT/US 96/05521
	tion) DOCUMENTS CONSIDERED TO BE RELEVANT	
Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	WO,A,91 16691 (JONHIG) 31 October 1991	1-5,15, 18,28, 38,40, 42-45, 49-62,82
	see abstract; claims; figures see page 9, line 32 - page 15, line 27	
A	US,A,4 926 325 (W.M. BENTON) 15 May 1990	
4	EP,A,O 484 603 (IBM) 13 May 1992 	
		·
		·
	·	

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information on patent family members

Inte onal Application No
PCI/US 96/05521

Patent document cited in search report	Publication date	Patent i memb		Publication date
WO-A-9310503	27-05-93	US-A-	5453601	26-09-95
		AU-A-	2013695	20-07-95
		AU-A-	2013795	20-07-95
		AU-A-	2013895	20-07-95
		AU-A-	2013995	20-07-95
		AU-B-	658233	06-04-95
		AU-A-	2739292	17-06-93
		CA-A-	2080452	16-05-93
		CN-A-	1073789	30-06-93
		DE-T-	542298	16-12-93
		EP-A-	0542298	19-05-93
		HU-A-	65212	02-05-94
		IL-A-	103397	18-06-96
		JP-A-	6162059	10-06-94
		JP-B-	7111723	29-11-95
		PL-A-	300041	05-04-94
		US-A-	5455407	03-10-95
		ZA-A-	9208773	13-05-93
WO-A-9308545	29-04-93	AU-B-	663739	19-10-95
		AU-A-	2888692	21-05-93
		BR-A-	9205416	17-05-94
		CA-A-	2098481	17-04-93
		EP-A-	0567610	03-11-93
		JP-T-	6503913	28-04-94
		PL-A-	299825	18-04-94
		US-A-	5440634	08-08-95
WO-A-9116691	31-10-91	AT-T-	127949	15-09-95
		AU-B-	653721	13-10-94
·		AU-A-	7664491	11-11-91
		CA-A-	2058982	13-10-91
		CN-A,B	1057535	01-01-92
		DE-D-	69112975	19-10-95
		DE-T-	69112975	29-02-96
		EP-A-	0479982	15-04-92
		ES-T-	2034929	16-11-95
		PL-B-	169723	30-08-96
US-A-4926325	15-05-90	 EP-A-	0438930	31-07-91
U3-4-47C03C3	19-09-30	Er-A-	0430330	J1 0/ J1

anformation on patent family members

Inte ional Application No
PCT/US 96/05521

Patent document cited in search report	Publication date	Patent family member(s)		Publication date
EP-A-0484603		CA-A- DE-D-	2054582 69022424	10-05-92 19-10-95
		DE-T- JP-A- JP-B-	69022424 4227154 7123256	28-03-96 17-08-92 25-12-95
		UP-B-	7123230	

Form PCT/ISA/210 (patent family annex) (July 1992)