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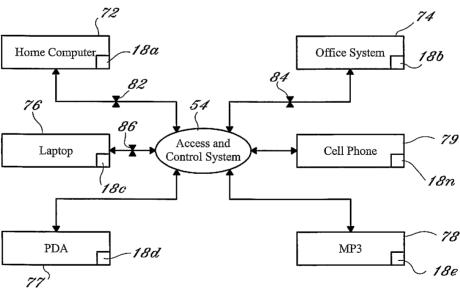
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with international search report

[Continued on next page]

(54) Title: MANAGED PEER-TO-PEER APPLICATIONS IN A SECURE NETWORK



(57) Abstract: Applications, systems and methods of efficiently accessing and controlling data of devices among multiple computers over a network Access and control system (54) manages the synchronizing of version of files between a plurality of heterogeneous devices (72, 74, 76,77, 78, 79). The computers may be located behind different firewalls without detriment to the functionality of the present applications, systems and methods Peer applications synchronize file structures from one computer to another computer (18a, 18b, 18c, 18d, 18e, 18n). Files are synchronized using Delta files and Inverse Delta files

- before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments
- (88) Date of publication of the international search report: 27 March 2008

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US04/37608

A. CLASSIFICATION OF SUBJECT MATTER IPC: G06F 15/16(2006.01),17/00(2006.01)							
USPC: 707/203;709/248 According to International Patent Classification (IPC) or to both national classification and IPC							
B. FIEL	B. FIELDS SEARCHED						
Minimum documentation searched (classification system followed by classification symbols) U.S.: 707/203; 709/225, 248; 726/11							
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. DOC	UMENTS CONSIDERED TO BE RELEVANT						
Category *	Citation of document, with indication, where appropriate, of the relevant passages		the relevant passages	Relevant to claim No.			
X Y	US 6,571,245 B1 (HUANG et al.) 27 May 2003 (27.0	05.2003), columns 4, 11-12 1-6, 9-14, 16, 21-22, 24-26, 135, 137-139, 160-165, 181, 183, 186, 187, 201, 203-208, 210,211, 215-217					
Y	7, 8, 1 50, 13 20 US 6,104,716 A (CRICHTON et al.) 15 August 2000 (15.08.2000), columns 3, 15 7, 8, 1 50, 13						
Further documents are listed in the continuation of Box C.			See patent family 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 application or patent published on or after the international filing date		d p "X" d	date and not in conflict with the application but cited to understand the principle or theory underlying the invention				
"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" d c	"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				
	t referring to an oral disclosure, use, exhibition or other means	0	bvious to a person skilled in the art				
"P" document published prior to the international filing date but later than the priority date claimed		"&" d	ocument member of the same patent fa	amily			
	ctual completion of the international search	Date of mai	Date of mailing Afthe Diamaional search report				
04 January 2008 (04.01.2008)			Authorized officer				
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		Patrice Winder Telephone No. 703-305-3900					

Form PCT/ISA/210 (second sheet) (April 2007)

INTERNATIONAL SEARCH REPORT

International application No.

PCT/US04/37608

Box No. II	Observations where certain claims were found unsearchable (Continuation of item 2 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 No. III	Observations where unity of invention is lacking (Continuation of item 3 of first sheet)			
	onal Searching Authority found multiple inventions in this international application, as follows: ontinuation 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 additional fees, this Authority did not invite payment of any additional fees.			
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.: 1-26,49,50,135-165,181-187,201-212 and 215-218			
Remark on l	Protest The additional search fees were accompanied by the applicant's protest and, where applicable, the payment of a protest fee.			
	The additional search fees were accompanied by the applicant's protest but the applicable protest fee was not paid within the time limit specified in the invitation.			

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US04/37608

	International application No.			
INTERNATIONAL SEARCH REPORT	PCT/US04/37608			
BOX III. OBSERVATIONS WHERE UNITY OF INVENTION IS LACKI	NG			
This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1. In order for all inventions to be examined, the appropriate additional examination fees must be paid.				
	•			
Group 1, claim(s) 1-26, 49-50, 135-139, 160-165, 181-187, 201-212, 215-217, draw into a file structure of a second computer.	in to integrating a file structure from a first computer			
Group 2, claim(s) 27-38, 140-159, 218, drawn to sending files between a first compu	iter and a second computer by a file transfer protocol			
	·			
Group 3, claim(s) 39-48, 219, drawn to implementing remote control by integrating	•			
Group 4, claim(s) 51-134, 188-197, drawn to managing subscriptions, validating ent device.	ries between local storage device and remote storage			
Group 5, claim(s) 166-172, drawn to accessing printers over a network.				
Group 6, claim(s) 173-180, drawn to tracking file transactions and modifications.				
The inventions listed as Groups 1-6 do not relate to a single general inventive concepthey lack the same or corresponding special technical features for the following reason not within the scope of a search for the features of the other groups.				
Continuation of B. FIELDS SEARCHED Item 3:				
DERWENT WPI (using BRS) search terms: firewall, aaa server, authentication server, synchronize, consistent, file,	document			