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**Gallant et al.**

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(54) **SELECTIVE FILE CACHING METHOD**

2003/0009563 A1\* 1/2003 Douglis et al. .... 709/227  
2003/0078964 A1\* 4/2003 Parrella et al. .... 709/203  
2004/0181598 A1\* 9/2004 Paya et al. .... 709/227

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**OTHER PUBLICATIONS**

NetCloak Version 3.1 User's Guide: Serving Cloaked Files,  
1996-2999, 3 page excerpt.\*

(\* ) Notice: Subject to any disclaimer, the term of this  
patent is extended or adjusted under 35  
U.S.C. 154(b) by 521 days.

"How to Prevent the Storing of File in the Hard Disk  
Cache"; <http://www.web-caching.com/forums/Forum1/HTML/000233.html>; Jun. 25, 2003.

(21) Appl. No.: **10/610,142**

"How Disk Caching Works in Java Plug-in"; <http://java.sun.com/products/plugin/1.3/docs/cache.html>; Jun. 25, 2003.

(22) Filed: **Jun. 30, 2003**

\* cited by examiner

(65) **Prior Publication Data**

*Primary Examiner*—Wayne Amsbury

US 2004/0267702 A1 Dec. 30, 2004

(57) **ABSTRACT**

(51) **Int. Cl.**

A method for improving performance through selective file  
caching is disclosed. The caching policy of a client's  
browser cache is set to cache all files. Web page files that  
reference a dynamic file include JavaScript code that  
mangles the dynamic filename, such that a reference by the  
web page file to the dynamic file is unique each time a  
browser processes the web page file. In one embodiment,  
the filename is mangled by appending to it a known string  
followed by a 12-digit timestamp. Consequently, the  
mangled filename misses in the cache, forcing the browser  
to fetch the dynamic file from the web server. The web  
server recognizes the filename is in the mangled format,  
regenerates the original filename, and returns the file to the  
client. Static filenames are not mangled; hence, they are  
satisfied from the browser cache. The method also works to  
selectively defeat network caching.

**G06F 7/00** (2006.01)

(52) **U.S. Cl.** ..... **707/102; 709/246; 711/202**

(58) **Field of Classification Search** ..... **707/102;**  
**709/246; 711/202**

See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

6,029,175 A \* 2/2000 Chow et al. .... 707/104.1  
6,192,398 B1 \* 2/2001 Hunt ..... 709/213  
6,457,103 B1 \* 9/2002 Challenger et al. .... 711/133  
6,557,054 B1 \* 4/2003 Reisman ..... 710/33  
6,557,076 B1 \* 4/2003 Copeland et al. .... 711/118  
6,918,113 B1 \* 7/2005 Patel et al. .... 717/178  
6,976,090 B1 \* 12/2005 Ben-Shaul et al. .... 709/246  
6,988,135 B1 \* 1/2006 Martin et al. .... 709/224  
2002/0049834 A1 \* 4/2002 Molnar ..... 709/219

**53 Claims, 11 Drawing Sheets**

Web Browser Operation

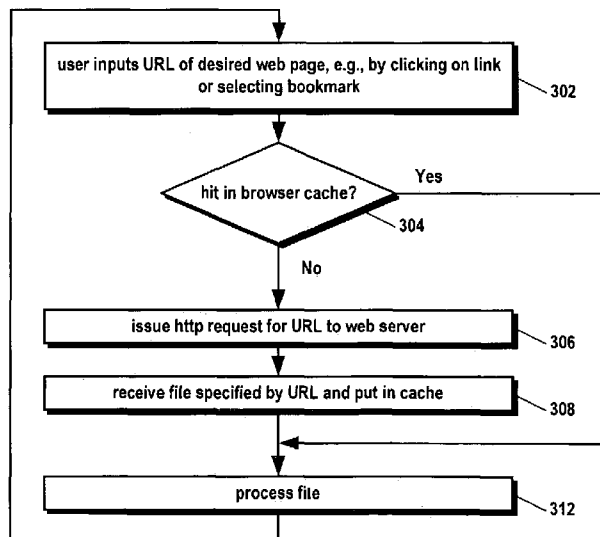


Fig. 1

Computer Network

100

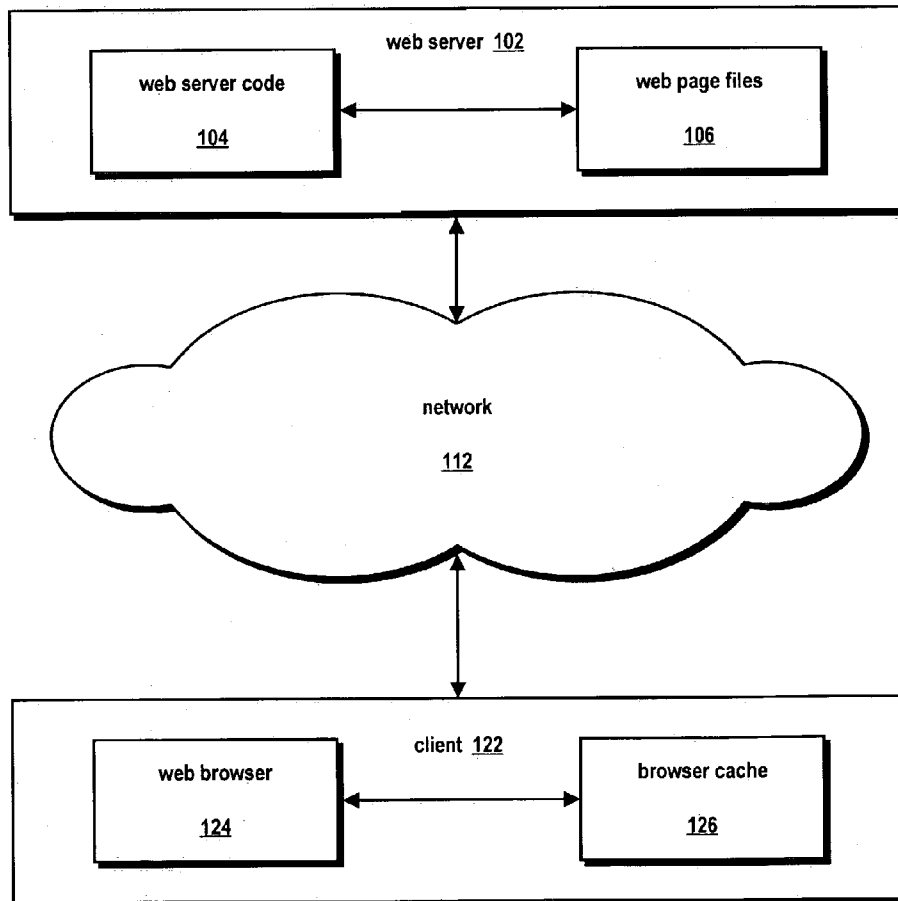


Fig. 2

Web Server Operation

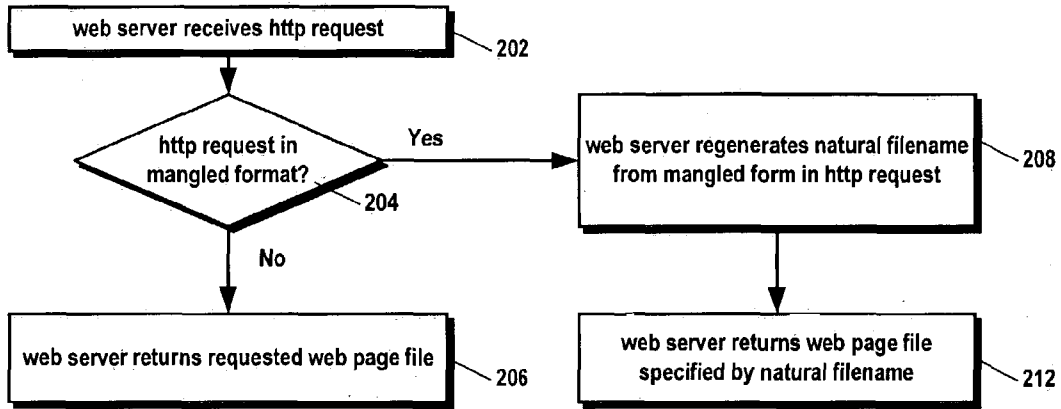


Fig. 3

Web Browser Operation

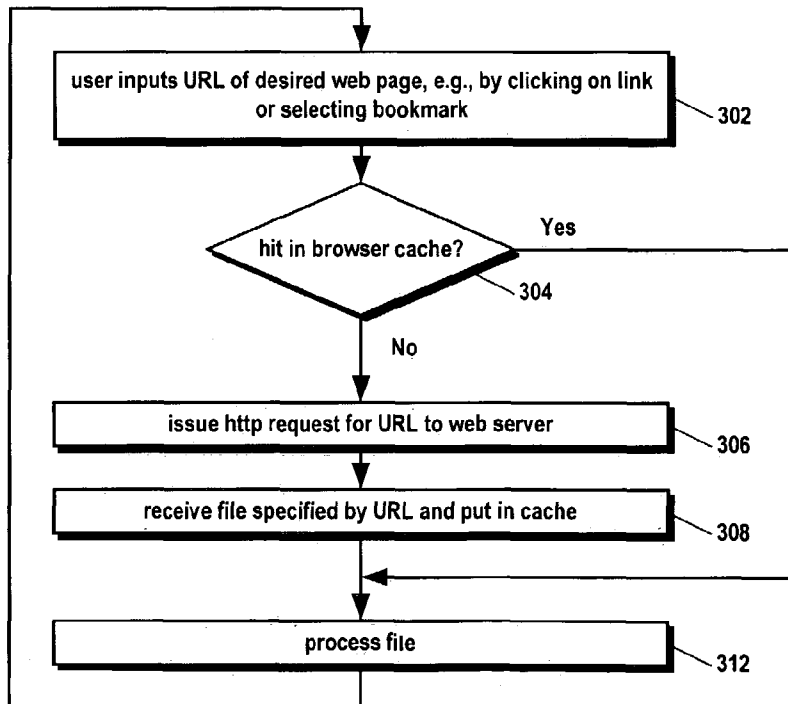


Fig. 4

Web Browser Operation

312

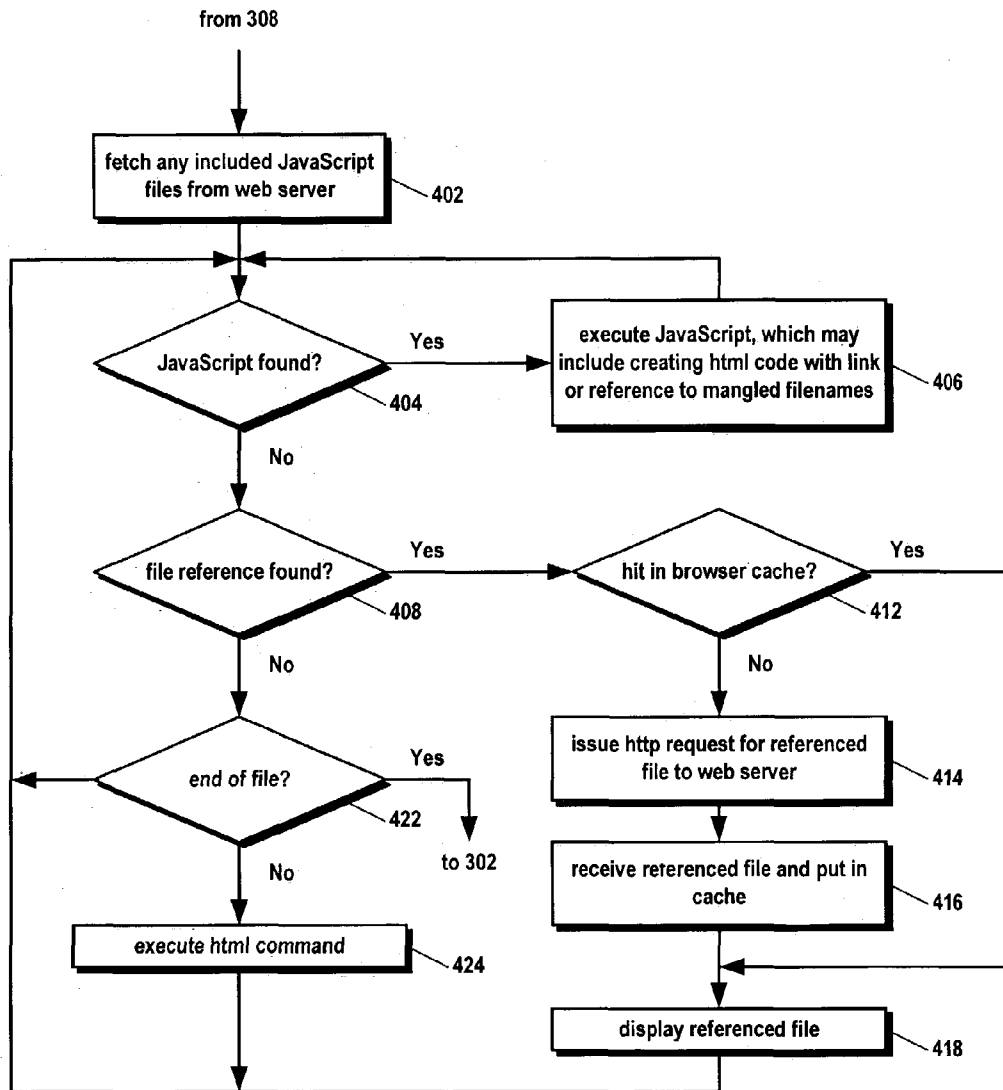
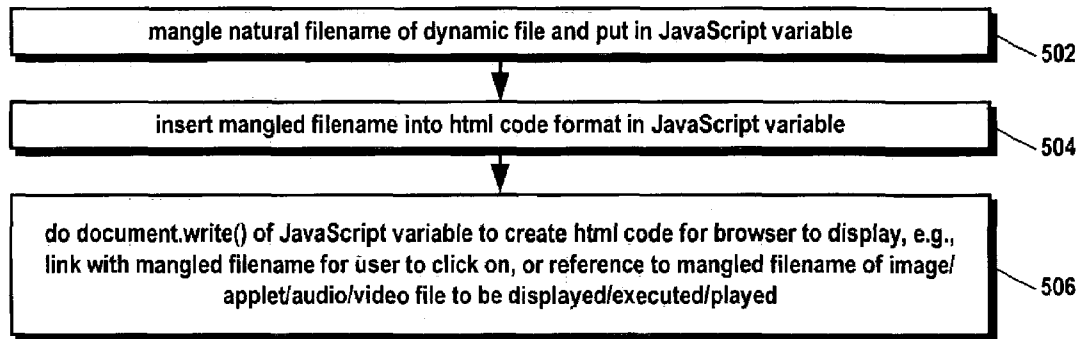


Fig. 5

Web Page JavaScript HTML Code Creation



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