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(12) **United States Patent**
**Liao**

(10) **Patent No.: US 9,800,609 B2**
(45) **Date of Patent: Oct. 24, 2017**

(54) **METHOD, DEVICE AND SYSTEM FOR DETECTING MALWARE IN A MOBILE TERMINAL**

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( * ) Notice: Subject to any disclaimer, the term of this patent is extended or adjusted under 35 U.S.C. 154(b) by 8 days.

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(30) **Foreign Application Priority Data**

Jul. 30, 2013 (CN) ..... 2013 1 03261916

(51) **Int. Cl.**

| | |
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| ***G06F 21/56*** | (2013.01) |
| ***G06F 9/445*** | (2006.01) |

(52) **U.S. Cl.**

CPC ..... ***H04L 63/145*** (2013.01); ***G06F 8/61*** (2013.01); ***G06F 21/563*** (2013.01); ***G06F 21/567*** (2013.01); *G06F 2221/2115* (2013.01)

(58) **Field of Classification Search**

CPC ..... G06F 8/61; G06F 21/56–21/568; G06F 2221/2115; H04L 63/1416; H04L 63/1441–63/145

See application file for complete search history.

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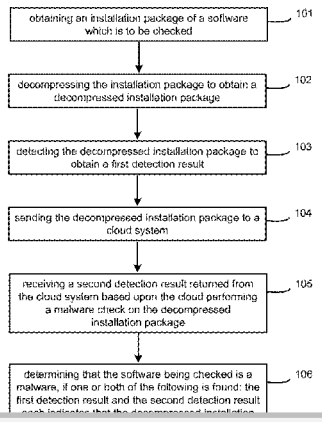
(57) **ABSTRACT**

A method, device and system for detecting malware in a mobile terminal are disclosed. The method includes at least the following operations: obtaining an installation package of a software which is to be checked; decompressing the installation package to obtain a decompressed installation package; detecting the decompressed installation package to obtain a first detection result; sending the decompressed installation package to a cloud system; receiving a second detection result returned from the cloud system based upon the cloud performing a malware check on the decompressed installation package; determining that the software being checked is a malware, if one or both of the following is found: the first detection result and the second detection result each indicates that the decompressed installation package is abnormal.

**15 Claims, 4 Drawing Sheets**



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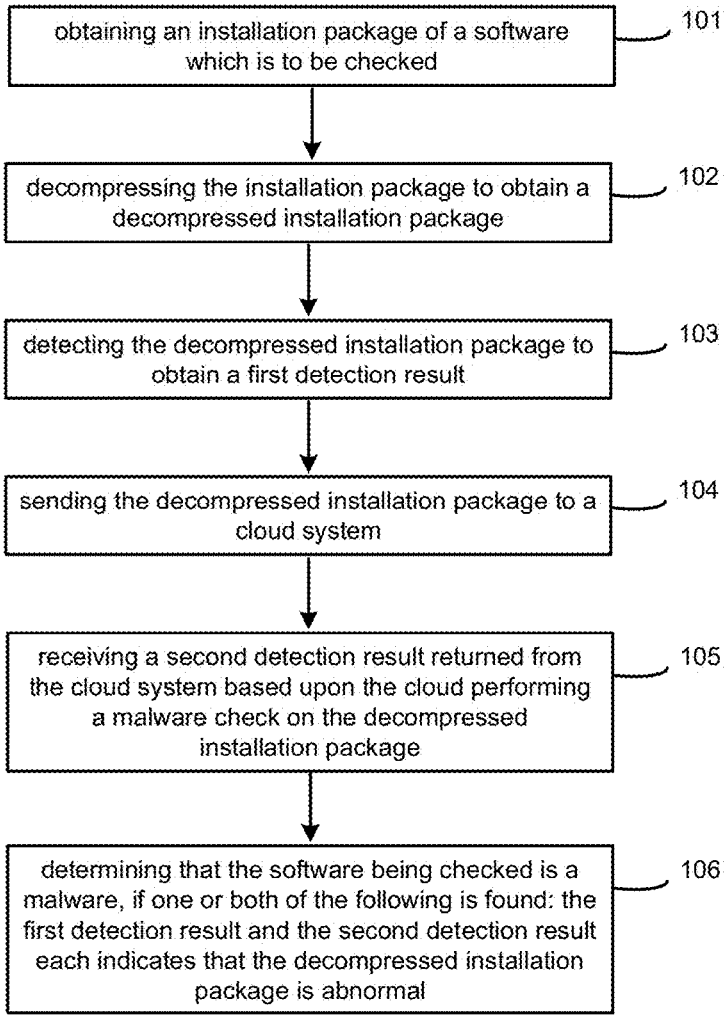


Figure 1

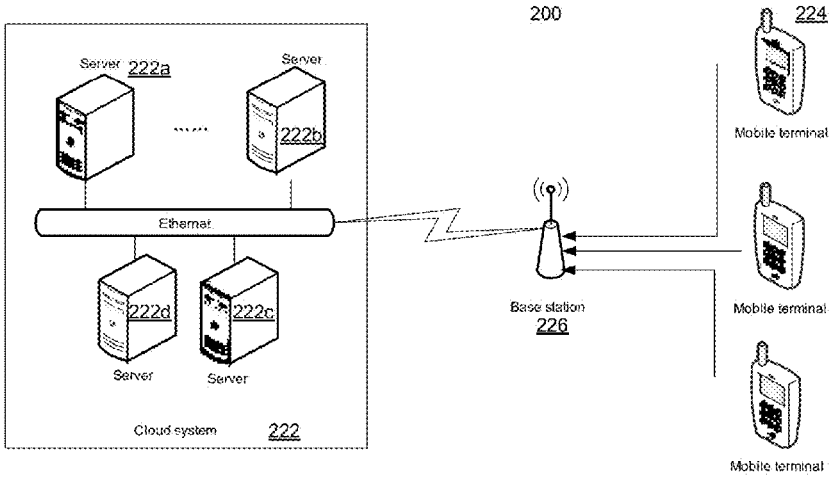


Figure 2a

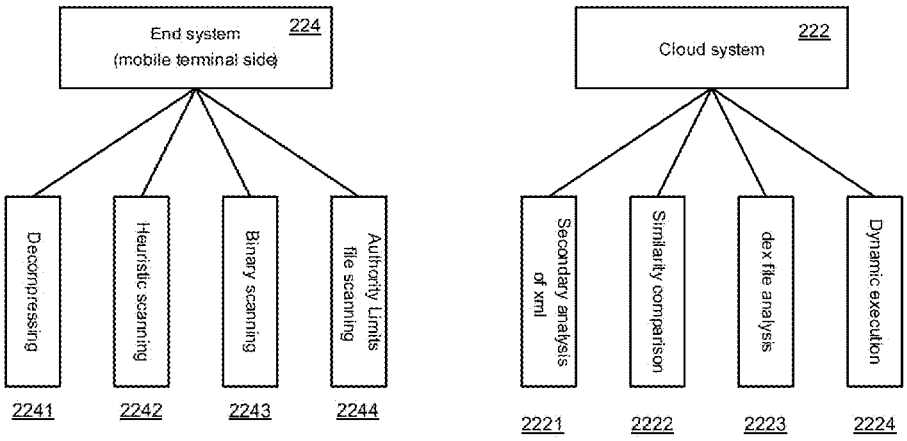


Figure 2b

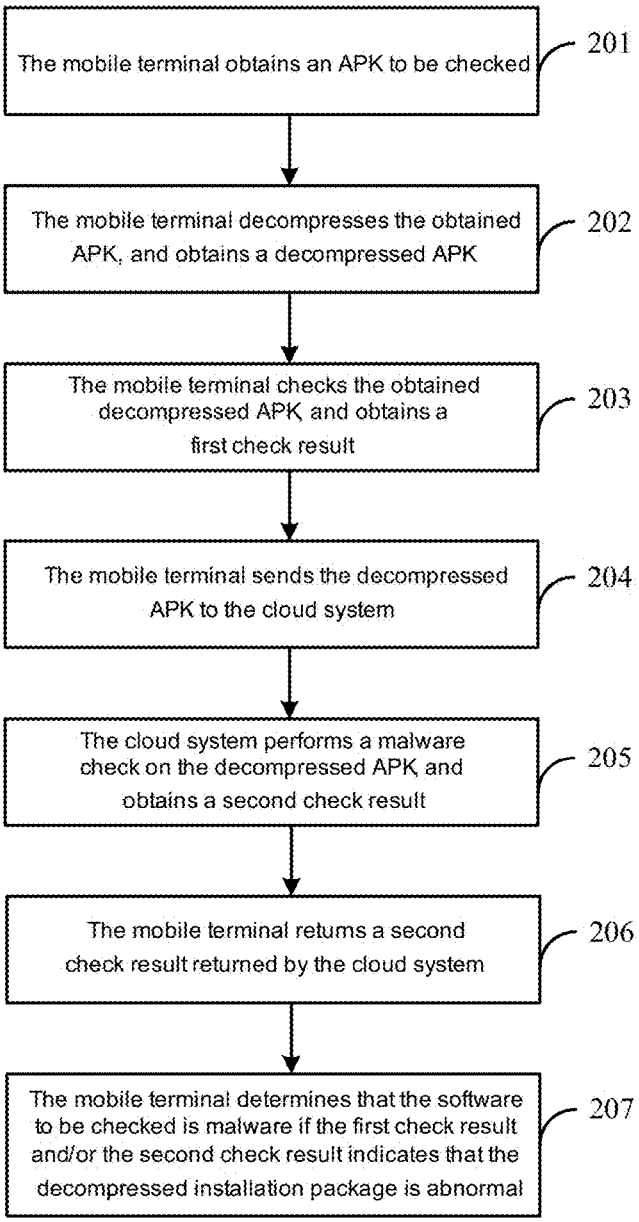


Figure 2c

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