CMSC 436 Quiz #7

Apri 4, 2013

Name: _____   **Directory ID**: _____

Problem 1

What is the purpose of signing Android applications with a certificate whose private key is held by their developer?[4pts]

Solution:

This certificate identifies the author of the application. The purpose of certificates in Android is to distinguish application authors. This allows the system to grant or deny applications access to signature-level permissions and to grant or deny an application's request to be given the same Linux identity as another application.

Problem 2

If you broadcast an Intent to a broadcast receiver, are the permissions checked when the broadcast is sent, or when it is delivered to the receiver? If there are permission failures, will you receive an exception?[4pts]

Solution:

The sendBroadcast(Intent) method checks permissions as data is being delivered to each receiver, after the method call has returned, so you will not receive an exception if there are permission failures.

Problem 3

Determine the correctness of following statements. [3pts]

✓	✗	Description
■	☐	By default, every Android application runs with a distinct Linux user ID and group ID.
☐	■	Android applications can request additional permissions dynamically at run-time.
☐	■	Since all Android applications must be implemented in Java, the Java Virtual Machine serves as a security boundary.