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**Reg. No. :**

**Question Paper Code: 47084**

B.E. / B.Tech. DEGREE EXAMINATION, NOV 2017

Seventh Semester

Information Technology

14UIT704 – MOBILE APPLICATION DEVELOPMENT (Regulation 2014)

Duration: Three hours Maximum: 100 Marks

Answer ALL Questions

PART A - (10 x 1 = 10 Marks)

1. Android is licenced under which open sourse licensing license?

(a) Gnu’s GPL (b) Apache/MIT (c) OSS (d) Sourceforge

2. Which one is not a nick name of a version of Android?

(a) Cupcake (b) Gingerbread (c) Honeycomb (d) Muffin

3. The name of the program that converts java byte code into Dalvik byte code.

(a) Android interpretive Compiler AIC (b) Dalvik Compiler

(c) Dex Compiler (d) Mobile interpretive Compiler MIC

4. What runs in the background and doesn’t have any User interface Components

(a) Intents (b) Content Providers (c) Services (d) Applications

5. What is contained within the Layout at xml file?

(a) The code which is compiled to run the app

(b)  The strings used in the app

(c)  The permissions required by the app

(d)  Orientations and layouts that specify what the display looks like

6. Which of the following are not a component of an APK file?

(a) Dalvik executable (b)  Native Libraries

(c)  Resources (d)  All of these are components of the APK

7. When the activity is not in focus, but still visible on the screen it is in?

(a)  Running State (b)  Paused State

(c)  Stoped State (d) Destroyed State

8. Which of the following is not a state in the liecycle of a service?

(a)  Starting (b)  Running (c)  Destroyed (d) Paused

9. Which is not included in the Android application framework?

(a) WindowManager (b)  NotificationManager

(c)  DialerManager (d)  PackageManager

10. Which of the following is a NOT valid form of notification invoked by the

NotificationManager?

(a) A Flashing LED (b)  A persistent icon in the status bar

(c)  A sound played (d)  A SMS sent

PART - B (5 x 2 = 10 Marks)

11. The android application is developed to work on 3D graphics rendering and playback of

audio and video. Name the libraries that has to be added to enable above features?

12. Write the name of a special kind of view that can be embedded on your device’s Home

screen. Explain shortly.

13. What is Activity Lifecycle?

14. The android application need to start, stop and pause video. Suggest the few methods to implement the above functions.

15. List the methods suitable for User Interface testing.

PART - C (5 x 16 = 80 Marks)

16. (a) (i) Write in detail about various Android libraries and application frame work. (10)

(ii) Explain briefly about anatomy of an Android application. (6)

Or

(b) (i) Write the various elements in the main window of Android Studio? Explain. (6)

(ii) An Android application may be tested by installing and running it either on a

physical device or in an Android Virtual Device (AVD). How will you create an

Android Virtual Device (AVD) in Android Studio? (10)

17. (a) (i) What are the key advantages to using XML resource files to design a user

interface as opposed to writing a Java code . (8)

(ii) Apply the grid layout concept for adding and Viewing buttons as child view in

XML resource files. (8)

Or

(b) How will you build each component to get your first app widget up and running on the Home screen? (16)

18. (a) Write a overview of intents in the form of explicit intents and implicit intents

together with an introduction to intent filters. (16)

Or

(b) Explain the importance of saving and restoring the state of a user interface at

particular points in the lifetime of an activity. (16)

19. (a) Develop an Android application to implement Broadcast receivers. (16)

Or

(b) Develop android applications that allows to invoke the standard Android video

recording interface. (16)

20. (a) (i) Create a SQLite on an Android Virtual Device (AVD). (8)

(ii) Create a Java Classes for Android SQLite. (8)

Or

(b) Apply the white box testing, black box testing and automation in Android mobile applications. (16)