



Progressive Education Society's
Modern College of Arts, Science & Commerce (Autonomous), Ganeshkhind, Pune – 16
End Semester Examination: March / April 2025
Faculty: Science and Technology

Program: BCA

Semester: VI

SET: A

Program (Specific): BCA (Science)

Course Type: DSE

Class: TYBCA(Science)

Max. Marks: 70

Name of the Course: Android Programming

Course Code: 24-BCA-361

Time: 3Hr

Paper: I

Instructions to the candidate:

- 1) *All Questions are compulsory.*
- 2) *Figures to the right indicate full marks.*
- 3) *Draw a well labelled diagram wherever necessary.*

Q1) Attempt the following

Marks

A) Choose the correct option

[5*1=5]

1. _____ is the core component of Android Architecture.
a) Windows Kernel b) Linux Kernel
c) Mac Kernel d) Unix Kernel
2. _____ method is called when an Activity is first created.
a) onPause() b) onStart()
c) onCreate() d) onDestroy()
3. _____ is the base class for all UI components in Android.
a) View b) ViewGroup
c) Layout d) Widget
4. _____ View is used to display editable text in Android
a) TextView b) EditText
c) AutoCompleteTextView d) Button
5. To manage SQLite databases in Android _____ class is used.
a) SQLiteDatabase b) DatabaseHelper
c) SQLManager d) Cursor

B) Attempt the following

[5*1=5]

1. Name any two tools included in the Android SDK.
2. State the purpose of an Activity in Android.
3. State the basic difference between View and ViewGroup?

4. What is the purpose of a ProgressBar in Android?
5. Define SQLite in Android?

Q2) Answer the following (any 5)

[5*3=15]

1. List and explain the key features of Android.
2. Explain the difference between Explicit and Implicit Intents.
3. Define is Split Screen / Multi-Window mode. Explain how is it implemented.
4. How to implement VideoView for online video playback?
5. How do you send an email from an Android app? Give Example.
6. Discuss how do you implement Reverse Geocoding in Android?

Q3) Answer the following (any 5)

[5*4=20]

1. Explain the architecture of Android with a neat diagram
2. Define a Toast in Android. How do you implement it?
3. Compare LinearLayout, RelativeLayout, and ConstraintLayout
4. Explain the use of DatePicker with an example.
5. Define Cursor in SQLite? How do you use it to retrieve data?
6. Explain how to send an SMS programmatically in Android.
7. Explain the different types of Google Map views available in Android.

Q4) Answer the following (any 5)

[5*5=25]

1. Explain the complete Activity Lifecycle with a diagram.
2. Explain how do you use a ListView to display a long list of items.
3. How do you create an Options Menu and Context Menu in Android?
4. Explain the steps to create and use an SQLite database in Android.
5. How do you insert records in SQLite? Provide an example.
6. How do you obtain and use a Google Maps API Key in an Android project?
7. How do you display a map using SupportMapFragment?
