

SVKM'S  
Mithibai College of Arts, Chauhan Institute of Science &  
Amrutben Jivanlal College of Commerce and Economics (Autonomous)  
Academic Year (2022-23)

10 MAR 2023

Class: S. Y. B.Sc.(Computer Science) Semester: IV  
Program: Bachelor of Science Max. Marks: 75  
Course Name: Android Developer Fundamentals Time: 10:30 am to 1:00 pm  
Course Code: USMACS404 Duration: 2hrs 30 minutes  
Date:

**REGULAR EXAMINATION**

**Instructions:** Candidates should read carefully the instructions printed on the question paper and on the cover of the Answer Book, which is provided for their use.

- 1) This question paper contains 2 pages.
- 2) All questions carry equal marks.
- 3) Answer to each new question to be started on a fresh page.
- 4) Figures in brackets on the right hand side indicate full marks.

**Q.1. Attempt any Three** (21)

- a. With the example differentiate framework and library (7)
- b. Explain Scroll View and write a code snippet for the same (7)
- c. Differentiate List View and Recycle View (7)
- d. Develop code to add toggle button and display the toggle value (7)

**Q.2. Attempt any Three** (21)

- a. Develop code and process to add image in a page (7)
- b. Develop code to increase counter on tap of button
- c. Develop UI code to add image in background and to add two text field and one toggle button and at the end one button (7)
- d. Elaborate the light mode and Dark mode with the example and write down the precaution's measures. (7)

**Q.3. Attempt any Three** (21)

- a. Develop code to accept Name age address from the user, store the details in one JSON structure and save the data in JSON. (7)
- b. Elaborate following firebase authentication method (7)  
Mobile auth  
Email auth  
Custom auth
- c. Discuss loader write code for loader. (7)
- d. Elaborate how mobile and server can interact with each other and list the required permission. (7)

**Q.4. Attempt any Three**

**(12)**

- a. Discuss pubspec.yaml file. (4)
- b. With the help of an example explain following (4)
  - 1. Assest
  - 2. Build.gradle
- c. Differentiate Firebase cloud firestore and Firebase RTDB (4)
- d. Differentiate Hybrid application development and native application development (4)

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