

Question Paper



MANIPAL UNIVERSITY

**SCHOOL OF INFORMATION SCIENCES
FIRST SEMESTER MASTER OF ENGINEERING - ME (COMPUTING
TECHNOLOGIES AND VIRTUALIZATION)
DEGREE EXAMINATION - NOVEMBER 2017
DATE : Friday, November 17, 2017
TIME : 10:00AM - 1:00PM**

Android programming using Java [VIR 619]

Marks: 100

Duration: 180 mins.

A

Answer all the questions.

- 1) a) What is object oriented programming? How is it different from the procedure-oriented programming? (10)
(6 marks)
b) What do you mean by just in time (JIT) compilation? (4 marks)
- 2) List and explain the various operators used in Java. (10)
(10 marks)
- 3) Explain the following terms with their uses (10)
(2.5 x 4 marks)
a) super b) static c) finalize() d)
Garbage Collection
- 4) Define the following (10)
a) Abstract class (3 marks)
b) Multilevel Inheritance (2 marks)
c) Dynamic method dispatch (3 marks)
d) Method overriding (2 marks)
- 5) a) What are the difference between Checked and Unchecked Exceptions (2 marks) (10)
b) Explain in details the different ways of handling the exception in Java (8 marks)
- 6) Explain the basic building block components of android (10)

application. (10 marks)

- 7) With a neat diagram explain activity lifecycle of an android application (10 marks) (10 marks)
- 8) What is Broadcast Receiver? Explain the way to implement receiver class and also ways of registering in android system. (3+7=10 marks) (10)
- 9) a) What are Content Providers? (5 marks) (10)
b) Why does Android system need Content Providers? (5 marks)
- 10) With neat diagram explain types of JDBC drivers (10 marks) (10)

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