

B.E. Fifth Semester (Computer Technology) (C.B.S.)
Object Oriented Modeling

P. Pages : 2

Time : Three Hours



NKT/KS/17/7344

Max. Marks : 80

- Notes :
1. All questions carry marks as indicated.
 2. Solve Question 1 OR Questions No. 2.
 3. Solve Question 3 OR Questions No. 4.
 4. Solve Question 5 OR Questions No. 6.
 5. Solve Question 7 OR Questions No. 8.
 6. Solve Question 9 OR Questions No. 10.
 7. Solve Question 11 OR Questions No. 12.
 8. Due credit will be given to neatness and adequate dimensions.

1. a) Explain architecture of UML in detail. **7**
b) Explain the terms generalization as extension and generalization as restriction with example. **7**

OR

2. a) Explain Association and types of association in detail. **6**
b) Describe various principles of modeling. **4**
c) Explain the concept of information hiding with example. **4**
3. a) Draw a class diagram for University course registration system. **6**
b) State and discuss various stages of OMT. **7**

OR

4. a) How polymorphism is achieved in collaboration diagram? Explain with suitable example. **6**
b) What is the use of self in messages. **3**
c) Explain callback mechanism in detail. **4**
5. a) Draw a nested state diagram for a Pepsi-vending machine in detail. **7**
b) Give an event Trace diagram for Railway Reservation system. **6**

OR

6. a) Define Process and Thread. **2**

- b) Write short notes on 6
- i) Package diagram. ii) Use cases.
- c) What are different symbols used in DFD. Draw a DFD for calculating volume of cylinder and sphere. 5
7. a) What are the various Architectural Modeling techniques are available? Explain with example. 7
- b) What is component diagram? What are its various components. 6
- OR**
8. Draw and explain deployment diagram for ATM machine. 13
9. a) Explain how architecture centric processes are used to guide use cases. 8
- b) Describe unified process model in detail. 6
- OR**
10. a) Why we need iterative and incremental development approach for s/w system. 6
- b) Explain in detail steps of object Design. 5
- c) How use cases are test? Explain. 3
11. a) What is the need of architecture? Explain with example. 6
- b) Explain architecture of Architecture centric processes in detail. 7
- OR**
12. a) Explain various steps to architecture. 4
- b) Write a detailed description about unified Library application. 9
