

Roll No.

Total No. of Pages : 02

Total No. of Questions : 18

**B.Tech.(CSE) (2011 Onwards E-II) (Sem.-7,8)**  
**OBJECT ORIENTED ANALYSIS AND DESIGN**

Subject Code : BTCS-906

M.Code : 71898

Time : 3 Hrs.

Max. Marks : 60

**INSTRUCTION TO CANDIDATES :**

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains FIVE questions carrying FIVE marks each and students have to attempt any FOUR questions.
3. SECTION-C contains THREE questions carrying TEN marks each and students have to attempt any TWO questions.

**SECTION-A**

**Answer briefly :**

- 1) How to achieve multiple inheritance in a single inheritance system?
- 2) Why is a large number of simple classes better than a small number of complex classes?
- 3) State the importance of anti-patterns.
- 4) What is a test case?
- 5) When to use Unit testing?
- 6) List the various testing strategies.
- 7) Write note on frameworks.
- 8) How is the use case model useful in every phase of software development?
- 9) What are object-oriented metrics?
- 10) What is class?

## SECTION-B

- 11) Describe briefly encapsulation and Inheritance.
- 12) How is the use case model useful in every phase of software development? Discuss.
- 13) Develop an activity diagram to show the business process of the library.
- 14) What are the graphical diagrams defined in UML? Illustrate each.
- 15) Describe System level testing with example..

## SECTION-C

- 16) What is factory pattern? Explain with example.
- 17) Explain Use-case driven approach in object oriented system development with the payroll system as a case study.
- 18) Develop activity / class diagrams for the following use case of the banking system : Identify all the classes, responsibilities and collaborators processes for the objects.
  - i) Deposit in saving account
  - ii) Withdrawal from saving account (both acceptance and denial)
  - iii) Balance checking

**NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.**