

**BIM / Sixth Semester / IT 224: Software Engineering**

*Candidates are required to answer all the questions in their own words as far as practicable.*

**Group "A"**

**[10 × 1 = 10]**

**1. Brief Answer Questions:**

- i. Differentiate between generic and custom product.
- ii. What do you mean by emergent property of system?
- iii. Define risk triangle.
- iv. What is reverse engineering?
- v. What is the disadvantage of open source development?
- vi. List different reliability perspectives in socio-technical system.
- vii. Differentiate between event-driven modeling and data driven modeling.
- viii. What is ethnography?
- ix. Differentiate between alpha testing and beta testing.
- x. Why inspection is better than testing?

**Group "B"**

**[5 × 4 = 20]**

**Exercise Problems:**

2. What is test case? Write a test case for a function which calculates factorial of given number.
3. Write six functional and two non-functional requirements for restaurant billing system.
4. Draw sequence diagram of any system that you are going to develop.
5. What modification can be made in agile development principle so, that it can be used in large software project development.
6. What is incremental development? Explain when to use it and draw its process.

**Group "C"**

**[2 × 5 = 10]**

**Comprehensive Questions:**

7. Why do you think that involvement of end users have become necessary in software development process? How agile methods address this issue?
8. Explain importance of software re-engineering.

