

S.Y.B.Sc. (Computer Science)
Semester IV Examination
USCS-242 Software Engineering

Time: 2:00 Hours]

[Marks: 35

Instructions to candidate:

1. All questions are compulsory.
2. Draw neat labeled diagrams wherever necessary
3. Figure to the right indicate full marks

Q.1 Solve any FIVE of the following [5]

- a) Define: Software Engineering.
- b) What is agility?
- c) Define: prototyping.
- d) What is meant by XP?
- e) What is meant by ASD?
- f) What is requirement validation?

Q.2A] Answer any TWO of the following. [6]

- a) Define terms: i) Agile Method ii) Agile Process
- b) What are the advantages of scrum?
- c) Explain the purpose of Use case diagram with example.

B] Answer any TWO of the following. [4]

- a) Explain in brief waterfall model with diagram.
- b) List the activities of spiral model in detail.
- c) List the elements of Analysis model.

Q.3A] Answer any TWO of the following. [6]

- a) Explain a software process framework in detail.
- b) Explain any four symbols used for use case diagram.
- c) State the disadvantages of Incremental model.

B] Answer any TWO of the following. [4]

- a) Explain different approaches for requirements elicitation.
- b) Write classification of UML diagrams.

c) Draw the symbols for the following;

- i) Active class ii) Component
- iii) Artifact iv) Node

Q.4 Answer any **TWO** of the following.

[10]

- a) Explain any four symbols of class diagram with example.
- b) Draw UML class diagram for railway reservation system.
- c) What is the importance of design model?
