## **Internal Assessment Question Paper – 1**

## Ramaiah Institute of Technology (Autonomous Institute, Affiliated to VTU)

**Department of CSE** 

Date: 11/6/2021 Programme: B.E Term: Feb-May 2021 Course: Software Engineering Course Code: CS46 CIE: I Sem: IV Section: A,B&C

Max Marks: 30 **Portions for Test:** Unit1 and 2 Time: 1Hr

## **Instructions to Candidates:**

- 1. Question 1 is Compulsory and answers any one from Q2 and Q3. Each Question carries 15M.
- 2. You must write the answer on paper using good quality pen. Please retain this written sheets/paper that should be submitted once you come to college.
- 3. To avoid that any of your solutions get lost, make sure to write your name and USN on each sheet of paper that you submit in order.
- 4. Write clearly. Answers that are illegible cannot be counted as correct answers. Read carefully before you answer and observe instructions carefully!
- 5. Mobiles, smart watches or any electronic gadgets are strictly banned inside the exam hall.

Sl#	Question	Marks	Bloom's	CO
DIII	Question	IVIGI ISS	Level	Mapping
1	a) State the advantages and disadvantages of the evolutionary	6	L4	CO1 and
	model of software development. Is it more, or less, suitable			CO5
	than the waterfall model for safety-critical projects? Justify			
	your answer.			
	b) Compare the requirements modeling for WebApps and generic application. Discuss the situation when to perform explicit analysis activity in WebApps development.	5	L4	CO2
	<ul> <li>c) Identify the non-functional requirement type for the following list of requirements. Justify the answer.</li> <li>i. The system should be available 99% of the time between 8.00 am and midnight</li> <li>ii. Average response time should be less than 5 seconds</li> <li>iii. The system shall only be accessible to authorized users</li> <li>iv. The new system should be available for the commencement of the XYZ project</li> </ul>	4	L3	CO2 and CO5
2	a) What are the characteristics of good requirements modeling (SRS) to ensure accurate reflection of stakeholder needs and that it provides a solid foundation for design?	4	L2	CO2
	b) Discuss the agility and cost of change relation through clear graph. Discuss any four principles of agile process.	6	L2	CO1
	c) What software process model(s) would you choose for development of a word-processing package project? why? Justify in choice. Discuss the steps of the selected process model in brief.	5	L3	CO1
3	a) Compare the two different ways for representation of Capability Maturity Model Integration (CMMI)	6	L3	CO1
	b) Read the following statement of requirements:	5	L3	CO2 and CO5

automated ticket-issuing system sells rail tickets. Users select			
their destination and input a credit card and a personal			
identification number. The rail ticket is issued and their credit			
card account charged. When the user presses the start button, a			
menu display of potential destinations is activated, along with a			
message to the user to select a destination. Once a destination has			
been selected, users are requested to input their credit card. Its			
validity is checked and the user is then requested to input a			
personal identifier. When the credit transaction has been			
validated, the ticket is issued.			
i.Discover ambiguities in the statement for part of a ticket-			
issuing system			
ii. Identify and list a set of functional requirements (at least two)			
for the ticket-issuing system.			
c) Illustrate the input and output of domain analysis with neat	4	L2	CO2
diagram and list the role of the domain analyst.			

## Course Outcomes meant to be assessed by the IA Test1:

CO1: Explain the various aspects of the software process, considering the important process models and addressing the debate between prescriptive and agile process philosophies.

CO2: Understand the analysis and design methods using object-oriented techniques and UML modeling, focusing on web/mobile applications.

CO5: Apply the concepts of software engineering principles on the real-world problems of software development using appropriate tools.