

PARUL UNIVERSITY
FACULTY OF IT & COMPUTER SCIENCE
M.Sc.IT 2024-25 Mid-Term Examination

Semester: 2
 Subject Code: 05202108
 Subject Name: Software Engineering with Agile

Date: 18-03-2025
 Time: (1hr:30min)
 Total Marks: 40

Instructions:

1. Figures to the right indicate full marks.
2. Make suitable assumptions wherever necessary.

Q.1	Answer the following.	CO	PO	BL	[10]
(a)	3 short questions of 1 mark each				[3]
	(i) Enlist any two basic components of a system.	1	1	1	
	(ii) List out the key phases of the Classical SDLC model? List them.	2	2	1	
	(iii) Define software.	1	2	1	
(b)	Objective type/MCQs/True-False/Fill in blanks (7 questions of 1 mark each)				[7]
	1. What does RAD stand for? a) Rapid Application Document b) Rapid Application Development c) Relative Application Development d) None of the above	2	1	1	
	2. True or False: Agile methods seem to work best when team members have a relatively high skill level. (True / False)	4	2	2	
	3. Which of the following threatens the quality and timeliness of the produced software? a) Business risks b) Potential risks c) Technical risks d) Known risks	2	1	1	
	4. In Agile methodology, the _____ is responsible for maximizing the product value and managing the product backlog.	2	1	1	
	5. The _____ model helps in representing the system's dynamic behavior.	2	2	2	
	6. _____ is not a direct measure of SE process. a) Effort b) Cost c) Efficiency d) All of the above	1	1	1	
	7. In a Data Flow Diagram (DFD), a _____ represents the transformation of data from input to output.	2	2	2	
Q.2	Answer the following. (2 or 3 mark questions)				[10]
(a)	Two Questions of 2 Marks				[4]
	(i) Explain why the Waterfall model is suitable for developing Airplane Flight Control Software. Provide relevant reasons and phases of implementation.	2	2	2	(02)
	(ii) Discuss any two Software Application Domains in brief.	1	1	2	(02)
(b)	Two Questions of 3 Marks				[6]
	(i) Describe the Classical Systems Development Life Cycle (SDLC) method and its phases.	2	2	2	(03)
	(ii) Define Process and discuss the process framework activities in brief.	1	1	3	(03)
Q.3	Attempt any TWO.				[10]
	(i) Write a detailed note on Requirement Engineering and give example.	1	1	3	(05)

	(ii) Compare Prototype and RAD Model.	2	1	4	(05)
	(iii) Define SRS and make SRS of online food ordering system.	2	3	5	(05)
Q.4	Answer the following.				[10]
(a)	Create a E-R Diagram and Decision Tree for Employee leave management.	3	3	4	(05)
(b)	Discuss Adaptive Software Development Process Model in detail with figure.	2	3	4	(05)
OR					
(b)	Discuss Scrum process Model in detail with figure.		3	4	(05)