

V-SEM./CSE/IT/2021(W)  
TH-III Software Engineering

Full Marks: 80

Time- 3 Hrs

Answer any five Questions including Q No.1 & 2  
Figures in the right hand margin indicates marks

1. Answer All questions 2 x 10
  - a. Define phase containment error.
  - b. Write two advantages of Prototype model?
  - c. Define risk.
  - d. Which software product is treated as organic type?
  - e. Define fan-in and fan-out.
  - f. Why SRS is called as black-box specification of the system
  - g. What do you mean by a metaphor in UID?
  - h. Define debugging.
  - i. Distinguish between alpha and beta testing.
  - j. Define software reliability
  
2. Answer Any Six Questions 5X6
  - a. Discuss about different matrices used for project size estimation.
  - b. Differentiate between hardware and software reliability.
  - c. Discuss about different integration testing.
  - d. What is code inspection? How it is different from code walk through?
  - e. Define DFD. explain different level of DFD with example.
  - f. Suppose a project was estimated to be 400 KLOC. Calculate the effort and development time for each of the three model i.e., organic, semi-detached & embedded
  - g. Explain team structure with diagram.
  
3. Define SRS. Write about different category of user of SRS document. Discuss the characteristic of a good SRS document. 10
  
4. Define cohesion and coupling. Explain their classification. 10
  
5. What is testing? Discuss about white box testing. 10
  
6. Discuss about different types of user interface. 10
  
7. Briefly discuss the spiral model of software development. why spiral model is known as a meta model. 10