

## **CS6403 / SOFTWARE ENGINEERING**

### **IMPORTANT 16 MARK QUESTIONS**

#### **UNIT - 1**

1. Explain in briefly about software engineering.
2. Explain in briefly about software lifecycle.
3. Explain in briefly about software engineering paradigm.
4. Explain in briefly about software engineering layer technology.
5. Explain in briefly about software process.
6. Explain in briefly about prescriptive and specialized process models.
7. Explain in briefly about waterfall model, incremental process models, evolutionary process and concurrent model.
8. Explain in briefly about classic life cycle model.
9. 5. Explain in briefly about software project management estimation.
10. Explain in briefly about software cost estimation.
11. Explain in briefly about lines of code.
12. Explain in briefly about cocomo model.
13. Explain in briefly about software project scheduling.
14. Explain in briefly about earned value analysis.
15. Explain in briefly about risk management

#### **UNIT - 2**

1. Explain in briefly about software requirements.
2. Explain in briefly about software requirement document
3. Explain in briefly about requirement engineering process.
4. Explain in briefly about structured analysis.
5. Explain in briefly about classical analysis.
6. Explain in briefly about data dictionary

### **UNIT - 3**

1. Explain in detail the design concepts.
2. Explain the flow of information during software design with neat diagram.
3. Explain the iterative process in a software design.
4. What are the requirements to be translated into a blueprint for constructing the software?
5. Write few guidelines which will be used in software design.
6. Give the evolution of software design process.
7. Give the fundamental software design concepts.
8. Discuss about Architectural design, with emphasize on fan in, fanout, coupling, cohesion and factoring.
9. Explain the design steps of the transform mapping.(Or) Explain the transform mapping in detail.
10. Explain the core activities involved in User interface design process with necessary block diagrams.
11. What are the characteristics of good user interface design? describe how UID may be developed for a data acquisition system?
12. Discuss about Architectural design,with emphasize on fan in, fanout, coupling, cohesion and factoring.

### **UNIT - 4**

1. Explain the types of software testing.
2. Explain about the software testing strategies.
3. Explain in detail about Black box testing.
4. Explain the internal views of testing.
5. Write elaborately on white box testing for software. How do you develop test suites?
6. What is white- box testing? Explain how basis path testing helps to derive test cases to test every statement of a program
7. Explain in detail about Integration testing.

8. Explain incremental, top-down, bottom-up testing in detail
9. Discuss software implementation techniques and debugging guidelines
10. Explain system testing and debugging. How they are implemented in coding practices and refactoring.
11. Explain Regression, Unit testing, Integration testing and bottom up testing.

## **UNIT - 5**

1. Explain about software cost estimation.
2. Explain the methods of decomposition for software cost estimation.
3. Explain the decomposition for LOC and FP in software cost estimation.
4. Explain in detail about COCOMO model.
5. Explain various levels in COCOMO model.
6. Describe function point analysis with a neat example.
7. Explain the objectives and important of function point analysis with an example
8. Mention the challenges of risk management.
9. Discuss risk management and its various types in detail.
10. Explain process and project metrics.
11. What are the measures in process and project with their advantages?
12. Explain EVA in detail
13. Explain the metrics used in EVA and how it is used in our software project.
14. Explain project scheduling and tracking.
15. Explain the relation between people and effort, task set & network, EVA in detail.