Total No. of Questions : 09

M.Sc.(IT)/PGDCA   (Sem.–2)
SOFTWARE ENGINEERING
Subject Code : PGCA-1912
M.Code : 77841
Date of Examination : 12-07-22

Time : 3 Hrs.   Max. Marks : 70

INSTRUCTIONS TO CANDIDATES :
1. **SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.**
2. **SECTION - B & C have FOUR questions each.**
3. **Attempt any FIVE questions from SECTION B & C carrying TEN marks each.**
4. **Select atleast TWO questions from SECTION - B & C.**

SECTION-A

1.   **Write briefly :**

   a) Why testing is important with respect to software?

   b) What is the difference between top-down and bottom-up approaches?

   c) What is Top-down design?

   d) Differentiate between waterfall and prototype model.

   e) What is the need of design methodologies?

   f)   What are different Process Metrics?

   g) What is the output of the system analysis phase?

   h) What do you mean by metrics?

   i)   Write four advantages of using software engineering for development of software.

   j)   Compare Unit Testing and Integration Testing.

SECTION-B

2. Explain the need for software measures and describe various metrics.

3. What are the various phases of a unified process? Explain in detail.

4. Distinguish between the Product and Process Metrics. Explain any two metrics of each type.

5. What is Re-engineering? How it is different from engineering? Explain briefly the economics of Re-engineering.

SECTION-C

6. What are the specialized Process Models? Explain them in detail.

7. Current trends in software engineering are moving away from the waterfall model for large and moving towards iterative methods such as spiral model. What we are gaining and losing as a result? Explain with suitable examples.

8. a) What are various software development Myths? Explain.

   b) What are the deployment level design elements? Explain in detail.

9. Explain the various design models in detail.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.