

Roll No.

Total No. of Questions : 18

Total No. of Pages : 02

B.Tech.(CSE/IT) (2012 to 2017 E-II) (Sem.-7)
SOFTWARE TESTING AND QUALITY ASSURANCE
Subject Code : BTCS-905
M.Code : 71897

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTION TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains FIVE questions carrying FIVE marks each and students have to attempt any FOUR questions.
3. SECTION-C contains THREE questions carrying TEN marks each and students have to attempt any TWO questions.

SECTION-A

Answer briefly :

1. What advanced process models have been proposed for software engineering work?
2. What are the main differences between a student software and industrial-strength software?
3. Differentiate between validation and verification.
4. Define 'Version Control'.
5. What basic concepts and principles are applied for testing object oriented software?
6. Differentiate between regression testing and stress testing.
7. What is a Baseline?
8. Write a short note on TQM.
9. How are define-use chains used in data flow analysis?
10. Explain the process of developing a test plan.

SECTION-B

11. Explain the technical metrics available for assessing the quality of test cases?
12. You have been appointed a project manager within an information systems organization. Your job is to build an application that is quite similar to others your team has built, although this one is larger and more complex. Requirements have been thoroughly documented by the customer. What software process model(s) would you choose and why?
13. Explain the software configuration management process. Highlight the role of configuration audit.
14. What is the importance of loop testing? Explain the techniques used to test loops in a program.
15. Write a short note on testing techniques for client/server systems.

SECTION-C

16. Explain various black-box techniques used to design effective test cases.
17. Write a short note on 'software quality assurance standards'.
18. Explain the following :
 - a. Alpha and beta testing
 - b. Fault based testing
 - c. Debugging process
 - d. Risk projection
 - e. Software reliability

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.