

PARUL UNIVERSITY
FACULTY OF IT & COMPUTER SCIENCE
MCA/IMCA Winter 2019 – 20 Examination

Semester: 5/9**Date: 02-12-2019****Subject Code: 05201339/05301539****Time: 10:30 am to 01:00 pm****Subject Name: Software Testing and Quality Assurance****Total Marks: 60****Instructions:**

1. All questions are compulsory.
2. Figures to the right indicate full marks.
3. Make suitable assumptions wherever necessary.
4. Start new question on new page.

Q.1 Answer the followings.**A. Answer the following in short.****(05)**

1. What is Testing?
2. Define Load testing?
3. List down levels of Testing.
4. Why is Software testing important?
5. What is Manual testing?

B. Multiple choice type questions/ Give the sentence true or false. (Each of 01 marks)**(10)**

1. The version of the release on which Alpha testing is performed is called "Beta Release".
(True / False)
2. Alpha testing is the system testing performed by a selected group of friendly customers.
(True / False)
3. SQA ensures that appropriate process and technology are used to achieve software security.
(True / False)
4. Exhaustive testing is possible and practicable. (True / False)
5. Scope of automation is the area of your Application Under Test which will be automated. (True / False)
6. _____ is called by the Module under Test.
 - a) Stub
 - b) Driver
 - c) Object
 - d) Method
7. For automating any application, which parameter(s) should be considered?
 - a) Platform independence
 - b) E-mail Notifications
 - c) A) and B) both
 - d) None
8. Confirming the identity of a person is called:
 - a) Authorization
 - b) Authentication
 - c) Availability
 - d) Confidentiality
9. Which of the following cannot be a part of software development?
 - a) Quality Control
 - b) Quality Assurance
 - c) Software Reliability
 - d) None
10. Penetration testing is a type of:
 - a) Performance Testing
 - b) Stress Testing
 - c) Security Testing
 - d) None

Q.2 Answer the followings. (Any Five) (15)

1. When to stop Testing?
2. List down the Elements of Software Quality Assurance.
3. Analyze Importance of Software Quality.
4. Define Validation and Verification.
5. List down the SQA Tasks.
6. Define Equivalence partitioning in detail with example.

Q.3 Answer the following. (Any three) (15)

1. Differentiate Alpha testing and Beta testing.
2. List and define the types of Installation testing.
3. List and define Testing objectives.
4. Write down a case study on software testing.

Q.4 Answer the following in detail.

A. Explain Six Sigma for Software Engineering. (05)

B. (1) Elaborate McCall's Quality Factors with diagram. (05)

B. (2) Elaborate methodologies of Integration Testing in Detail. (05)

OR

B. (1) Explain Software Reliability in detail. (05)

B. (2) List and explain Whitebox Testing Techniques. (05)