Each Question has multiple choice answers and carries 2 marks
Attempt all questions and mark the correct answers.

1. The difference between unit and integration test.
   a. The unit test is white box and integration test is black box testing
   b. There should not be failures in integration test
   c. The unit test is unnecessary while the integration test is mandatory
   d. The integration test is conducted for every time a unit of application is built.

2. What are the issues and challenges in waterfall model of SDLC?
   a. Managing change in the requirements
   b. Testing of code
   c. Frequent delivery and update
   d. Design issues

3. What is Test Driven Development?
   a. The tests are written after the code is developed.
   b. The application requirements drive the test cases
   c. Test first approach.
   d. Every test should succeed at first time only

4. What is the cultural challenge for DevOps?
   a) People need to learn new languages
   b) People need to work together across traditional role boundaries
   c) People need to work different hours
   d) People need to move desks frequently

5. In TDD who defines the unit test cases?
   a) The developer
   b) Product QA Tester
   c) Business Owner
   d) The Manager

6. What is TDD cycle?
   a) Every Test has first time failure
   b) Test-Implementation -Test.
   c) Test Failure- Implementation -Test Success-Refactor-Test
   d) TDD is just a single stage of development.
   a. Red-Green-Refactor

7. What are user acceptance tests?
   a) Tests to verify that every functional requirement has been implemented
   b) Testing that the user interface works
   c) Testing that system components works together
   d) Testing user interface usability

8. What should be the main consideration when writing code under TDD?
   a) Adding checks for possible bad values
   b) Writing the most efficient code
   c) Write the minimum code to pass the test
   d) Allowing for future expansion

9. What do code quality tools do?
   a) Static analysis of source code
   b) Check for compilation errors
   c) Translate one language into another
   d) *Debug code*

10. How do users get files from a remote Git repository?
    a) By doing a check out
    b) By doing an FTP transfer
    c) By cloning the remote repository to a local copy
    d) By adding the files using command gitadd

11. What advantage does Continuous Integration provide?
    a) It simplifies the build process
    b) It stops developers checking in bad code
    c) Build errors are quickly detected and reported
    d) There are no real advantages

12. What is a fake?
    a) A test double which returns fixed values
    b) A mocking framework
    c) A full implementation not suitable for production
    d) A test double which verifies how many times a method is called

13. What is code refactoring?
    a) Restructure the code to match the new requirements
    b) Restructure the code without changing the external functional behavior
    c) Refactoring is done before writing any test cases.
    d) Refactoring is done to improve code maintenance

14. Mark true or false
    a) For every function code there should be only one test case
    b) In One test case multiple behaviors are tested
    c) The Test cases are dependent on each other for execution
    d) Component under test is shared across all test cases.

15. What is assertion?
    a) Positively assert the unit code
    b) Verifies the result values and throws error in case of NOT matching.
    c) Controls the unit flow.

d) Process of assertive locking

16. What is true of following?
    a) Every test case should test for success only
    b) The test cases run in sequence during test execution
    c) The unit test cases are part of application delivery to client.
    d) Each of the test cases must be executed manually.

17. What is the advantage of TDD?
    a) The TDD makes the development incremental and iterative
    b) The TDD can be applied to legacy code.
    c) TDD increases the code coverage.
    d) The TDD increases the flexibility of code to match the changes.

18. What is the use of mocking in testing?
    a) It mocks frequently and is very funny.
    b) The mocking allows testing of the code in absence of dependencies.
    c) The mock objects allow verifying the behavior.
    d) Mocks are used in production code.

19. The BDD and TDD difference

    a) TDD supports unit test cases.
    b) BDD is complete different than TDD
    c) BDD is an extension of TDD to support Acceptance TDD
    d) The TDD does not support BDD criteria
20. What is Gold Plating in coding?
    a) Gold Plating is working on a task beyond the point where the extra effort is worth any value it adds.
    b) Writing complicated code
    c) Making user interfaces visually appealing
    d) Work which adds little or no value

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