

The test is a process operated within a set of rules that are used to determine whether the product is at the expected level, or to ensure that it reaches the desired level. In the software world, the test is a tool to enable a system or application to be run under specified conditions. What about Test Management?

Test Management:

Developed software project consists of identifying tests, organizing them, collecting test results using different test technologies and measuring progress to minimize projected or unpredictable errors. Of course, in developing a project, first of all, it is necessary to plan first to minimize the cost in this process because it is the "cost en that should be considered first.

Test Effort:

The cost of a test is also due to the amount of effort given to the test. As a result of research;

- System testing requires 16 percent to 29 percent of the total effort, depending on the size of the project.
- The identification of tests varies depending on the nature, complexity, and scope of the project.
- We need to do Test Measurement to determine whether the test is successful.

Test Measurement:

Test cases are valuable in improving the development process as they are used to measure a series of processes that include test results as well as to help improve the quality of a product. Some formulas were found to do Test Measurement:

- ✓ *Defect Removal Efficiency (DRE), or test effectiveness* is the ratio of the number of errors found during a test to the total number of errors.
- ✓ *Pass rate* is the ratio of successful tests to the total number of tests.
- ✓ *Passes versus failures* is the ratio of failed tests to successful tests.

In the light of all these formulas, the determined, successful and non-successful tests are listed in a graph and the results are listed.

In order for a test case to be useful, some conditions need to be determined;

- The purpose and importance of the test is defined briefly,
- This is defined if there is a prerequisite for the operation of the test.
- Determine which steps should be applied.
- The result of the test is what is expected to happen.
- The test period is determined when and how often.
- If the test has found more errors than expected, a list is made.

Although it may seem simple to determine these conditions, it is very important to keep a record of the tests performed.

There are many Test Tools available to facilitate Test Management, as well as Open or Closed. The following steps can be followed to decide which tool is more efficient;

- ✓ Interoperability online,
- ✓ A Test Scenario Management Tool should establish a triple connection between functional requirements, test cases, and errors. In this way, we can know which test conditions correspond to which requirements, determine requirements that do not have test conditions, or list errors for specific requirements.
- ✓ Interoperability with authentication systems. Ideally, each project participant must have a single identity and use it for everything, coding, reporting bugs, and doing trial tests.
- ✓ Cost and license.

The most important feature of a vehicle is not its technical capability, but how effectively it is used and how much it contributes to the development process.