

Building a Software Testing Environment

Creating an Environment Supportive of Software Testing

Risk Appetite for Software Quality

A *risk appetite* is the amount of risk that management is willing to take so that the software placed into operations will be risk-free. Management's risk appetite is the amount of gap that they are willing to accept. Reasons that the gap might exist include tight schedules, limited budgets, inadequate development and testing staff, and work processes that are prone to defects.

Data Problems

- Incomplete data
- Incorrect data
- Obsolete data

Risks Associated with Not Meeting Customer Needs

The test risks become the factors that need to be considered in the development of the test strategy. The following list briefly describes the test factors:

- Correctness
- File integrity
- Authorization
- Audit trail.
- Continuity of processing
- Service levels
- Access control
- Compliance
- Reliability
- Ease of use
- Maintainability
- Portability
- Coupling
- Performance
- Ease of operation

Developing a Role for Software Testers

- Testing for all or part of the test factors
- Ensuring that the documented specifications meet the true needs of the customer
- Improving the software testing process
- Improving the developmental test process
- Participating in acceptance testing

- Recommending changes to the software system
- Evaluating the adequacy of the system of controls within the software system

Writing a Policy for Software Testing

A software testing policy serves two purposes.

First, it is the basis for defining what software testers will include in the test processes.

Second, it explains to outside parties, such as organizational management, IT customers and users, as well as project personnel, the role and responsibilities of software testing.

Criteria for a Testing Policy

A testing policy is management's definition of testing for a department. A testing policy involves the following four criteria:

- Definition of testing. A brief but clear definition of testing.
- Testing system. The method through which testing will be achieved and enforced.
- Evaluation. How information services management will measure and evaluate testing.
- Standards. The standards against which testing will be measured.