

## Software Testing

### Description:

Software Testing course is more of job-oriented training which is designed as per current industry standards. You can start IT industry with basic and advance skills. Course will be trained by top industry experts who have passion to train students and help them get job in IT industry or excel in IT industry.

### Key Features:

- To understand the main purpose of Software Testing
- To know the Principles of the Software Testing
- To understand the Software Testing processes
- Key points to remember during Software Testing (Do's & Don'ts)
- Test Design and Test Execution practice exercise

### Course Content:

1. Software Engineering
  - 1.1 What is Software engineering?
2. Fundamentals of Software Testing
  - 2.1 What is Software Testing?
  - 2.2 Purpose of Software Testing – Why is Software Testing necessary?
    - 2.2.1 Error, Defect (Bug) and Failure
  - 2.3 Principles of Software Testing
3. Software Development Lifecycle (SDLC)
  - 3.1 Description of Software Development Lifecycle (SDLC)
  - 3.2 Different Software Development Model
    - 3.2.1 Waterfall
    - 3.2.2 V Model
    - 3.2.3 Agile
    - 3.2.4 Dev-ops
4. Test Design Concepts & Exercises
  - 4.1 Documents required for Test Design
  - 4.2 Tools for Test Design
  - 4.3 Design Exercise 1
  - 4.4 Three Points theory to remember always as a Software Engineer or Software Test Engineer
  - 4.5 Design Exercise 2
5. Software Testing Concepts
  - 5.1 Type of Software Testing
    - 5.1.1 Functional
    - 5.1.2 Non-Functional
  - 5.2 Levels of Software Testing
    - 5.2.1 Component Testing
    - 5.2.2 Integration Testing
    - 5.2.3 System Testing
    - 5.2.4 Acceptance Testing

- 5.3 Testing related to any Changes
  - 5.3.1 Retesting
  - 5.3.2 Regression Testing
- 5.4 Methods or Techniques of Software Testing
  - 5.4.1 Black Box Testing
  - 5.4.2 White Box Testing
  - 5.4.3 Grey Box Testing or Experienced Based Testing
- 6. Software Testing Lifecycle (STLC)
  - 6.1 Description of Software Testing Lifecycle (STLC)
    - 1.1.1 Requirement Analysis
    - 1.1.2 Test Plan
    - 1.1.3 Test Design & Test Review
    - 1.1.4 Test Environment Setup
    - 1.1.5 Test Execution
    - 1.1.6 Test Closure
  - 6.2 Defect Lifecycle Management
    - 6.2.1.1 Defect Lifecycle
    - 6.2.1.2 Difference between Priority and Severity
- 7. Type of applications and Testing performed on these
  - 7.1 Applications Type
    - 7.1.1 Desktop Application
    - 7.1.2 Web Application
    - 7.1.3 Mobile Application
  - 7.2 Testing Types performed on these
    - 7.2.1 Functional Testing
    - 7.2.2 Non-Functional
      - 7.2.2.1 Usability Testing
      - 7.2.2.2 Security Testing
      - 7.2.2.3 Compatibility Testing
      - 7.2.2.4 Accessibility Testing
      - 7.2.2.5 Performance Testing
        - 7.2.2.5.1 Load Testing
        - 7.2.2.5.2 Stress Testing
- 8. Difference between
  - 8.1 Quality Control & Quality Assurance
  - 8.2 Validation & Verification
  - 8.3 Smoke Testing & Sanity Testing
- 9. SQL Queries used during Software Testing
- 10. Unix Commands used during Software Testing
- 11. LIVE Projects (Test Design, Test Review, Test Execution, Defects Tracking)