# **Test Plan Document**

**Test Plan ID**: TP-2025-INV-01  
**Project Name**: Invoice Management System (IMS)  
**Version**: 1.0  
**Prepared By**: QA Lead – John Doe  
**Date**: 06-Oct-2025  
**Reviewers**: Project Manager, Dev Lead, Business Analyst

## ****1. Introduction****

The purpose of this test plan is to define the testing approach for the **Invoice Management System (IMS)**. IMS is a web-based application designed to automate invoice generation, approvals, payments, and reporting. The goal is to ensure that the system meets all functional, non-functional, and security requirements before deployment.

## ****2. Test Items (Modules/Features to be Tested)****

* User Authentication (Login/Logout)
* Invoice Creation
* Invoice Approval Workflow
* Payment Integration (via Stripe)
* Reporting Dashboard
* Notifications (Email/SMS)

## ****3. Features to be Tested****

* Secure user login and role-based access
* Creation of new invoices with line-item details
* Auto-calculation of tax, discount, and total
* Approval workflow (multi-level)
* Integration with Stripe for payments
* Invoice status updates (draft, pending, approved, paid)
* Report generation based on filters (date, client, status)
* Email alerts for invoice submission and approval

## ****4. Features Not to be Tested****

* Stripe internal processing (assumed tested by Stripe)
* 3rd-party email/SMS delivery after API success
* UI color scheme and branding consistency (covered by UI/UX team)
* Performance under 10,000 concurrent users (outside current scope)

## ****5. Test Strategy****

* **Testing Levels**: Unit Testing (Dev), Integration Testing, System Testing, Regression, UAT
* **Testing Types**:
  + Functional Testing
  + Regression Testing
  + API Testing (Postman)
  + Smoke Testing
  + Compatibility Testing (Browser)
  + Security Testing (basic OWASP checks)

## ****6. Test Deliverables****

* Test Plan Document
* Test Scenarios and Test Cases
* Test Data Sets
* Defect Reports (JIRA)
* Daily Test Execution Reports
* Final Test Summary Report
* Requirement Traceability Matrix (RTM)

## ****7. Entry and Exit Criteria****

**Entry Criteria:**

* Business requirements approved
* Test environment setup complete
* Test cases reviewed and approved
* Code freeze notification received

**Exit Criteria:**

* All high and critical test cases executed
* No open critical/severity-1 defects
* All test deliverables submitted
* UAT sign-off received

## ****8. Test Environment****

* **Web App**: Deployed on staging environment
* **Database**: MySQL 8.0
* **OS**: Windows 11, Ubuntu 20.04
* **Browsers**: Chrome, Firefox, Edge (latest versions)
* **Mobile**: Android (Chrome) and iOS Safari (basic compatibility check)
* **Tools**: Postman, JIRA, Selenium, TestNG

## ****9. Test Schedule****

| **Phase** | **Start Date** | **End Date** |
| --- | --- | --- |
| Test Planning | Oct 6, 2025 | Oct 7, 2025 |
| Test Case Design | Oct 8, 2025 | Oct 12, 2025 |
| Test Case Review | Oct 13, 2025 | Oct 14, 2025 |
| Test Execution (Cycle 1) | Oct 15, 2025 | Oct 20, 2025 |
| Regression Testing (Cycle 2) | Oct 21, 2025 | Oct 23, 2025 |
| UAT Support | Oct 24, 2025 | Oct 28, 2025 |
| Test Closure | Oct 29, 2025 | Oct 30, 2025 |

## ****10. Resource Planning****

| **Role** | **Name** | **Responsibility** |
| --- | --- | --- |
| QA Lead | John Doe | Planning, Coordination |
| QA Engineer 1 | Jane Smith | Test Design, Execution |
| QA Engineer 2 | Arun Patel | Regression, Automation |
| Dev Support | Ahmed Khan | Defect Fixes & Build Support |
| Business Analyst | Maria Gomez | Requirement Clarification |

## ****11. Tools & Automation Approach****

* **Test Management**: JIRA + Zephyr
* **Automation Tool**: Selenium WebDriver + TestNG (Java)
* **API Testing**: Postman Collections
* **CI/CD Integration**: Jenkins (Smoke Suite on every build)
* **Reporting**: Extent Reports for automation; JIRA dashboards for manual

## ****12. Risk and Contingency Plan****

| **Risk** | **Mitigation** |
| --- | --- |
| Requirements change mid-sprint | Freeze scope for current test cycle |
| Delay in test environment setup | Use local test environments temporarily |
| Unavailability of test data | Create mock data using scripts |
| High defect volume in integration phase | Prioritize blockers and coordinate with dev |
| Resource availability due to overlapping projects | Escalate early and reallocate if necessary |

## ****13. Approval & Sign-off****

| **Role** | **Name** | **Signature** | **Date** |
| --- | --- | --- | --- |
| QA Lead | John Doe | [Signed] | Oct 6, 2025 |
| Project Manager | Ravi Sharma | [Signed] | Oct 6, 2025 |
| Business Analyst | Maria Gomez | [Signed] | Oct 6, 2025 |
| Development Manager | Priya Mehta | [Signed] | Oct 6, 2025 |