Room Booking Test Plan

ENG10-RBTP-V1.0

Pawan Kumar

Sparta Global - Engineering 10

August 3, 2018

Table of content

Eng
10

Room Booking Test Plan

Test Plan Identifier

Doc.ref. ENG10-RBTP-V1.0

1.0 Introduction

1.1 Purpose

This is the master test plan for the room booking system for Sparta employees. The project will have 2 levels of testing; user acceptance testing and system testing. The estimated timeline for this project is 1 week. This document will detail the following sections; roles within the project, test items, approach, scope of the project, exit/entry criteria, environment, deliverables, risks and contingencies, testing tasks and schedule.

1.2 Roles

Test Lead	Pawan Kumar
Testers	Ali Karami
	Joseph Cheung
	Shaun Scott
	Anne Cooke
	Toweka Malcolm
	Sebastian Lewis
	Steven Besal

2.0 Scope

2.1 Test Items

Test items	Description
Login	Login as admin, login as user
Booking	Maximum occupancy, current and future bookings, prioritise
Manage booking and rooms	Add, edit, filter, cancel, update and view bookings Add rooms and view booking for rooms.

2.2 Features to be Tested

- Functionality
- Responsiveness

2.3 Features Not to be Tested

- Performance
- Accessibility
- Security

3.0 Approach (Strategy)

- The automated system and acceptance tests will be tested using Atom, Capybara, and Cucumber with Selenium-webdriver. No training will be required.
- Regression testing will not be taking place at this time. Regression tests in future should be based on severity of defects detected.
- Elements which can not be completed as a results of requirements, designs issues or are unable to be tested should be raised as a defect (with the acception of the tests that can be completed using exploratory testing). Defects with high severity which are unable to be tested should immediately be raised with a superior.
- Test conditions/scripts will be created from user stories, ready for execution.
- The order of the execution of tests will be prioritized based on dependencies and priority.
- Testing techniques to be used:
  - Use Case Diagrams
  - State Transition Diagrams
  - Exploratory Testing
  - Equivalence Partitioning
  - Decision Tables

3.1 Test Suites

Test Suite 1: User Login/Logout
- Users should be able to log in and out of the system

Test Suite 2: User Booking System
- Users should be able to book a room
- Users should be able enter a maximum occupancy
- Users should be able to see current and future bookings

Test Suite 3: Admin Login/Logout
- Admin should be able to log in and out with admin status

Test Suite 4: Admin Room Management
- Admins should be able to create a new room
  - New rooms should be assigned colours
- Admins should be able to edit an existing room

- Admins should be able to delete an existing room
- Admins should be able to set a maximum occupancy

Test Suite 5: Admin User Management
- Admins should be able to view all users
- Admins should be able to promote users to admins

Test Suite 6: Admin Booking Management
- Admins should be able to book a room for a specified time
- Admins should be able to prioritise bookings
- Admins should be able to edit and update bookings
- Admins should be able to delete a booking which is no longer needed
- Admins should be able to filter bookings
    - by time
    - for period of time (i.e. a week)
    - to view a single day of bookings for each room

4.0 Test Environment Details

4.1 Test Environment Requirements

- Single user environment
- Single platform - Macintosh
- Compatibilities - Chrome

4.2 Test Environment Setup

- Hardware setup - MacBook Air (13-inch, 2017)
- Software setup
    - Mac OS Sierra/High Sierra
    - Capybara
    - Ruby 2.4.0p0
    - RSpec 3.7.1
    - Chrome 67.0.3396.99

4.3 Test Environment Limitations and Migration

Tests are designed and conducted on MacOs machines with the software versions listed above. There is a probability that the tests might not be compatible with other software versions and operating systems.

5.0 Deliverables

- Test Feature Files
- Test Summary Report
- Incident Reports
- Test Automation Framework

6.0 Risks and Contingencies

6.1 Key

Scale	Likelihood	Severity
3	Highly likely	Blocker
2	Likely	Critical
1	Unlikely	Minor

6.2 Risk and Impact Table

Description	Risk type	Impact	Mitigation	Severity (1-3)	Likelihood (1-3)
Lack of staff availability/ absence	Organisation	If members of the team are absent or unavailable during the project, progress may decline	Plan for absences/ unavailability through appointing other team members to cover other work	1	2
Hardware malfunction	Technical	Will delay testing and result in less available resources for testing to be conducted	Ensure backup hardware are available in case of malfunctions, and care is taken with current hardware	3	2
Failure to correctly prioritise tests due to insufficient information	Organisation	Important tests may be left towards the end of the project and denied adequate focus	Ensure to communicate with the senior members of staff to agree priorities	1	2
Jira Malfunctions	Technical	Will negatively affect project documentation (e.g. backlog, reports and issues)	Backup data manually or on a seperate tool	1	2

WiFi Failure	Technical	Will negatively affect progress	Manually record information until WIFI is back online and host app locally	1	2
Testing team not provided access to the app	Organisation	Will cause delays in progress	Communicate with project manager to ensure the app is available prior to testing	1	1

7.0 Testing Tasks and Schedule

ID	Task	Assigned member	Start date	Duration (days)	End date
1	Project kick-off		03/08/2018		10/08/2018
2	Create test plan	All members	03/08/2018	1	03/08/2018
3	Creating user stories	All members	03/08/2018	2	06/08/2018
4	Test execution		06/08/2018	4	09/08/2018
5	Manual testing	Testers	06/08/2018	4	09/08/2018
6	Automated testing	Testers	06/08/2018	4	09/08/2018
7	Incident report	Testers	09/08/2018	1	09/08/2018
8	Summary report	Project manager	09/08/2018	1	09/08/2018
9	Project handoff	All members	10/08/2018	1	10/08/2018
10	Project closure		10/08/2018		10/08/2018

8.0 Entry/Exit Criteria

8.1 Entry Criteria

For testing to begin, the following entry criteria must be met:
- Defined and Approved Requirements
- Test Plan
- Feature Files & Test Data
- Test Tools
- Testable Code with Appropriate Test Environment

8.2 Exit Criteria

For testing to be complete, the following exit criteria must be met:
- All high-priority test cases should have been executed
- Coverage achieved should at least include all issues raised on Jira
- The schedule should be completed by the morning of Friday 10th August

9.0 Pass/Fail Criteria

For an item to pass a test the expected outcome and actual outcome must match when each test procedure is executed. Should there be a deviation the test case will be deemed a failure and a defect will be raised.

10.0 Suspension Criteria and Resumption Requirements

10.1 Suspension

Testing activities will be suspended if one or more of the following take place:
- The login system fails
- A defect is found that cannot allow further testing
- A defect is found resolving of which will result in a major (over 40%) redesign and implementation
- The hosting server fails to respond
- The hosting server responds to queries with delays longer than 10 seconds
- The location of testing is compromised due to potential power outage, fire or hazard

10.2 Resumption

Testing activities will be resumed when all aforementioned issues are resolved

11.0 Approvals

11.1 Levels

- First level: Test Lead - Pawan Kumar
- Second level: Test Manager - Robert Whitehouse

11.2 Document Sign Off

Pawan Kumar	p Kumar	03/08/2018
Robert Whitehouse	R Whitehouse	03/08/2018