

CODE TEST PLAN FOR VSB_PLUS

Change Log

Version	Change Date	By	Description
1.0	02/22/2020	Xinyu Liu	Create the test doc
2.0	03/30/2020	Xinyu Liu	Modify the doc

1	INTRODUCTION.....	2
1.1	SCOPE.....	2
1.1.1	<i>In Scope</i>	2
1.1.2	<i>Out of Scope</i>	2
1.2	QUALITY OBJECTIVE.....	2
1.3	ROLES AND RESPONSIBILITIES.....	2
2	TEST METHODOLOGY.....	3
2.1	OVERVIEW.....	3
2.2	TEST LEVELS.....	3
2.3	BUG TRIAGE.....	3
2.4	SUSPENSION CRITERIA AND RESUMPTION REQUIREMENTS.....	3
2.5	TEST COMPLETENESS.....	3
3	TEST DELIVERABLES.....	3
4	RESOURCE & ENVIRONMENT NEEDS.....	4
4.1	TESTING TOOLS.....	4
4.2	TEST ENVIRONMENT.....	4
5	TERMS/ACRONYMS.....	4

1 Introduction

The Test Plan is designed to describe the scope, approach and resources of testing of capstone project VSB_Plus.

The plan identify the functionality to be tested and the types of testing to be performed.

1.1 Scope

1.1.1 In Scope

All the feature of web application VSB_Plus which were defined in requirement document are need to be tested.

The mainly functionality include user logging in, course prerequisite reminding, course searching and planning the course schedule.

1.1.2 Out of Scope

These feature are not be tested because they are included in the software requirement specs.

- Website Security and Performance
- Hardware Interfaces

1.2 Quality Objective

The test objectives are to verify the Functionality of website VSB_Plus, the project should focus on testing the course operation such as course search and course schedule...etc. to guarantee all the these operation can work normally at the end of the project.

1.3 Roles and Responsibilities

The project should use capstone project members as the tester.

No.	Member	Tasks
1.	Test Manager	Manage the whole project Define project directions Acquire appropriate resources
2.	Scrum Master	Identifying and describing appropriate test techniques/tools/automation architecture Verify and assess the Test Approach Execute the tests, Log results, Report the defects.

2 Test Methodology

2.1 Overview

The project will adopt the Agile test methodology, because the project use the Agile developer management.

2.2 Test Levels

In the project VSB_Plus, there are a type of testing should be conducted.

- Unit Testing: Each unit function in web are tested individually.
- Integration UI Testing: Individual unit are combined and tested as a group
- PHP API Testing: Test all the APIs create for the web under tested.

2.3 Bug Triage

2.4 Suspension Criteria and Resumption Requirements

If the team members report that there are 40% of test cases failed. Suspend testing until the development team fixes all the failed cased.

2.5 Test Completeness

- Specifies the criteria that denote a successful completion of a test phase.
- Run rate is mandatory to be 100% unless a clear reason is given.
- Pass rate is 80%, achieving the pass rate is mandatory.

3 Test Deliverable

Test deliverable are provided as below

Before testing phase

- Test plans document.
- Test cases document

During the testing

- Test tool simulators
- Test Data

After the testing cycles is over

- Test Result/reports

4 Resource & Environment Needs

4.1 Testing Tools

No.	Resources	Descriptions
1.	Computer	
2.	Network	
3.	Server	

4.2 Test Environment

Environment configuration requirements:

1. python + selenium (last version)
2. DDT(version 1.4.1)
3. PyYAML (version 5.4.1)
4. xrlD (version 1.2.0)

5 Terms/Acronyms

Make a mention of any terms or acronyms used in the project

TERM/ACRONYM	DEFINITION
API	Application Program Interface
DDT	Data-Driven Tests
PyYAML	YAML in Python
xrlD	Excel library in the python