Let's Play NFL Football Test Plan

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Purpose
The purpose of this test plan is to check that all implementations are stable (consistent) and running accurately with minimal bugs and issues.

The Scope of the Plan
The features that will be tested are the SQL database, implemented A* algorithm, and all additional methods. The equivalent tests will be applied each time a new functionality is added in order to preserve the software's stability. I.e. with every function added, it must be successfully tested in order to not disrupt the rest of the program.

Tested from the User's Perspective
Any component of the GUI will be tested to assure accuracy (ex. Buttons direct users to the correct page and table correctly reflect DB data). Any component that hinders the flow of the program will be removed. This includes any item the user can see or interact with. Tables should display the same information as saved in the SQL database. Changes done to administration window tables should be reflected in SQL database tables.

Tested from the Team's Perspective
Any backend items will be tested to assure accuracy and that error-checking is working properly. This includes making sure the database connection is open, making sure any input files are read and stored correctly, the A* algorithm is running correctly, and any user input does not cause a crash or erroneous data.

Overall Test Strategy
The test strategy being used in this test plan is black-box testing. The reason black-box testing is used is so that functionality of this application can be tested without the tester having to care about the internal structures or workings of the code.

Entry Criteria
In order to begin testing, the following requirements must be met. Firstly, all test cases must be reviewed by the product owner. Secondly, the programmers code must be built and they have completed their own unit test.. Lastly the unit tests must be reviewed by the product owner.

Suspension Criteria

If at least 40% of planned testing fails, unit testing will immediately be suspended.

Exit Criteria

In order to end testing, the following requirements must be met. First, all reasonable tests have been satisfactorily conducted. Second, said tests have successfully passed each programmers unit tests. Lastly, the product owner has reviewed the results of the passing unit tests and integrates the new functionalities into the rest of the program.

Roles and Responsibilities of the Test Team

Programmer - Responsible for unit tests on every functionality they implement
Product Owner - Responsible for reviewing the results of unit tests and determining how to integrate it into the program

Schedule

Complete tests the week preceding the sprint review.

Environment Description

Tested on both Windows and Mac

Approval Process

All criteria will be reviewed and signed off by the product owner.