**Test and Verification Plan**

**Data Validation**

The price forecast graph should be verified on multiple days against actual and predicted closing prices.

* Commodity prices should be updated, stored, and returned over a consistent time interval.
* Predictor data should be updated, stored, and returned over a consistent time interval.

The weather outlook should be verified on multiple days against actual and predicted forecasts.

* Weather information should be stored in the database and queried daily.

The news section should be verified against the original.

* The system should query and return news on a consistent time interval.

The data from the home page and individual tabs should be the same

* Compare graphs and visuals from home page to individual tabs

**Feature Testing**

Where user input is required, all functions should be tested with both correct and incorrect input.

* If a validation table is used, all possible options should be tested.

All system functions accessed through menus should be tested.

* The model display should only show relevant information as selected.
* The weather display should only display the duration and location selected.
* The model’s page should perform the correct database queries based on the options chosen.

**Non-functional Testing**

Data should be collected, cleaned, and plotted by the system in an efficient manner.

* Soybean prices
* Weather
* Predicting variables

Color scheme and layout should be comfortable and pleasing