Technical Documentation

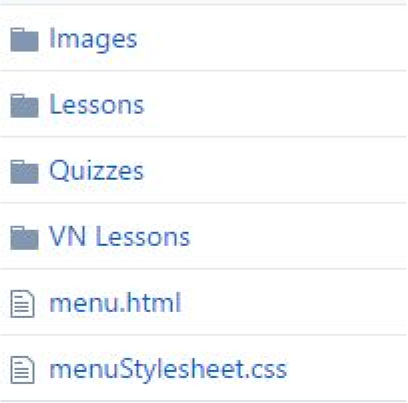
Github: https://github.com/SkylerMalinowski/WBSF

Objectives:

1. Discuss contents of github folders
2. Brief description of the purpose of each file

Front End Documentation

Learning System Folder:



Images

Lessons

Quizzes

VN Lessons

menu.html

menuStylesheet.css

This folder contains all the material needed for the learning system. This learning system includes the tutorial and quiz sections of our system.

Images folder: Currently the image folder contains only one file. This file, **stockmarket.png**, is used for the logo of our system.

Lessons Folder: The lessons folder contains 7 files in total. These files include 6 HTML files (**Lesson_1.html, Lesson_2.html,** ...) and one .css file (**lessonStylesheet.css**). The 6 html files are used to support each of the lesson pages that are included as part of our tutorial module. As of now, there is 6 lessons in total, hence the 6 files. The lone css file is used to support the format, color scheme, font sizes, etc. for the lesson pages.

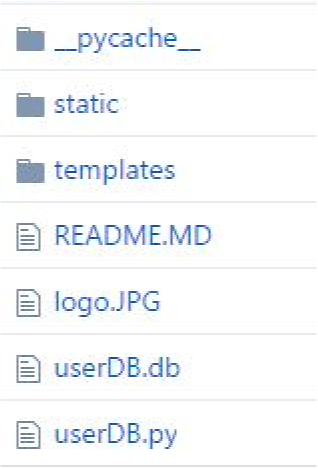
Quizzes Folder: This folder contains 7 html files, one css file and one folder. The 7 html files (**Quiz_1.html, Quiz_2.html,** ...) are used to display the web pages each quiz. There is one quiz for each lesson and one more that is used for user placement, quizzing to see what the user already knows and displaying what sections they should focus on. Again, the css file (**quizStylesheet.css**) is used for formatting. Lastly, this folder contains a folder named JavaScript. This folder contains two JavaScript files, **placementQuiz.js** and **quiz.js**, which contain code to get the user input from the quizzes. These files collect the user answers, support the “next question” buttons used in the quizzes, compare user answers to correct answers, and display how many questions the user correctly answered.

VN Lessons Folder: The VN lessons folder contains files needed to support the prototype Visual Novel lessons that may be included in the system. This folder contains one html file, one JavaScript file and two folders. The html file, **exampleNovel.html**, is used to support the web page where the Visual Novel will be displayed. The JavaScript file, **exampleNovel.js**, is used to display the Visual Novel. The two folders, **audio** and **images**, contain a .ogg file and 3 .png files, respectively. These files are used to support the audio and images that will be used as part of the Visual Novel.

menu.html: This HTML file supports the main menu page of the tutorial module. This page displays all the lesson titles and quizzes.

menuStylesheet.css: This .css file helps support the formatting of the main menu in the learning system.

userDB Folder:



__pycache__
static
templates
README.MD
logo.JPG
userDB.db
userDB.py

This folder contains all the material used to support the user database used in our system.

pycache folder: This folder contains 2 .pyc files (**testPlot.cpython-35.pyc** and **userDB.cpython-35.pyc**). Both of these files are used as cache to help support the plotting and userDB included in the system. Using a cache will help improve the speed of the system.

static folder: This folder contains one .ico file. This file, **favicon.ico**, is the logo of the system.

templates folder: This folder contains 5 HTML files (**dereg.html, index.html, out.html, print.html** and **reg.html**). The files **reg.html** and **dereg.html** are used to support the registration and deregistration pages in our system. The file **index.html** is used to support the main page of the system which allows a user to login and includes links to logout, register and deregister. This page also includes the functions to search stock symbols to get news and current price of the stock. The file **out.html** supports the logout page of the system. Lastly, the file **print.html** is used for administration login where an admin can enter a password and manage databases.

README.MD: This is a simple README file that shows all the required Python Package Index installations needed to run the code.

logo.JPG: This is a simple image file which contains the logo of the system.

userDB.db: This database file is used to store user information. This information includes: username, password, favorite stocks, recent searches, etc..

userDB.py: This python file is used to support and update the database as changes are made and more user info is needed to be stored.

Back End Documentation

Github folder Fetch_&_Plot contains the majority of our backend code. This code includes stock data fetching, a basic database interface, and graph plotting programs.

Contents:

Fetching_Bare.py :: Contains a simplified version of the code from **StockFetching.py**, and as such neither prints data to the console nor writes data to disk.

StockFetching.py :: Takes current stock data from Google Finance and prints it out to console ands writes the data to a file.

TestPlot.py :: Generates candlestick and line graphs of a stock's price data.

UnitTest3_27_17.py :: Contains unit tests that check the methods in **TestPlot.py** for accuracy and correctness.

YahooFetch.py :: Fetches Historical stock price data from Yahoo Finance between two dates specified by the user and prints the data to console.

YahooFetchYear.py :: Similar to **YahooFetch.py**, but fetches data between two different years, as specified by the user.

Database.db :: An example of our database file. In order for **db_1.py** to work, the database file can be empty (a newly created .db file) as long as it is named “database.db”. Contains a table storing stock quotes and price-time data for those stocks.

db_1.py :: A single method that takes an individual stock price data point and stores it into the stock price database. It can create a new sql table for each new stock (a stock not already in the database) and adds the data point to the stock table