**NBA Live Schedule**

Link to the Current Final Project: <http://ndhoka.pythonanywhere.com/finalproject>

**Brief Description of the Project:** The project is a website, that shows live up to date information on the games and standings of the American Basketball league, NBA

**Target Users:** Anyone who wants information on Live information on the Games and Standings of NBA matches.

**The Problem:** The project tries to give users structured and aesthetic information on the live games and standings of NBA matches.

**Hardware Limitations:** The project needs a web browser to run the website.

**Visual Design Implications:** The website can be viewed on any device that has a web browser. But it is always recommended to run the website on a desktop for the best experience.

**Technologies Used:**

1. Python for the Backend
2. Html, CSS for the front end
3. Bottle to integrate the two
4. API (<https://rapidapi.com/api-sports/api/api-nba/>) to get the live data about NBA

**Python Modules Used:**

1. Requests(to get the JSON data from the API)
2. Dt from DateTime (To get the live date)
3. PrettyPrinter from pprint(To sort out the JSON data so that can be accessed and interpreted easily)
4. Request from Bottle

**The Flow of the Website:**

1. The link above opens to a page where it asks the user if they want information on the games or the standings of the NBA.
2. If the User selects Games, the user is directed to another webpage asking the user if they want to get details on the live game or if they want games as per a custom date.
3. If the user selects the live option, then the backend python program automatically gets today’s date and shows the matches going on that date.
4. If the user selects a custom date, they are directed to a page allowing them to enter a date using the date picker. The program uses that date and displays all the matches on that date.
5. From the main page, if the user selects standings, then the user is directed to another page, from which they can pick if they want standings of the eastern or the western conference. The user has displayed the live standings depending upon the conference they choose.
6. The standings are beautifully displayed in a table using Html and CSS

**Problems fixed:**

1. The initial program that I had written for a different API, stopped giving out data, hence I had to switch my API completely and start from scratch again.
2. The current API’s server is most likely on the eastern side of the world and always has a date one day ahead of our date. Therefore, to fix this problem, I had to write python code. I had to take care of the leap years, the month of February, the year-end, and every possible problem that can occur with dates. So, in short, the code takes care of any possible issue with dates.
3. The API again started giving issues when implemented on the website where it is now giving a date that is one day before.
4. The Streak in the standings was not in the form we see it. There was a variable giving the streak and a variable giving True or False values to show if it was a winning streak or a losing streak.
5. Sort out the standings as per their rank. Cause the API did not have the teams in the order of their standings.
6. Improved the CSS of the webpage, so that the live match display webpage looks more organized.
7. Instead of having two different links for the standings, I want to use the radio button feature of HTML to ask the user and then process the same using a single file.
8. Sort the teams according to their ranks for the standings using a Lamba function as the JSON data is not ordered according to the ranks of teams.