**Problem**

New York (NY) is the most populous city in the United States; with an estimated 2018 population of 8,398,748 distributed over about 302.6 square miles (784 km2), New York is also the [most densely populated](https://en.wikipedia.org/wiki/List_of_United_States_cities_by_population_density) major city in the United States.

Sizable numbers of Indians began to migrate to the U.S. during the early 1900s, and settled primarily on the West Coast.

Despite many Indians in New York, recent immigrants have not settled in any concentrated areas. New arrivals live in apartments in densely populated areas of New York together with Indians and other immigrants, while more established Indians tend to move to suburban areas. The Indian population is permanently settling and growing in the United States, while its social and economic characteristics are becoming more diverse.

With the city’s diverse culture, comes a diverse food culture. The streets are filled with restaurants of different nationalities- Mexican, Chinese, European, Filipino, Indian etc. During the daytime, especially in the morning and lunch hours, office areas provide huge opportunities for restaurants.

In this project, we will primarily focus on the different parts of New York that have good Indian restaurants and delve into the details.

**Data**

We need to collect the following data for this project:

* New York data that contains list Boroughs, Neighborhoods along with their latitude and longitude.
  + Data source: <https://cocl.us/new_york_dataset>
  + Description: This data set contains the required information. We will use this data set to explore various neighborhoods of New York.
* Indian restaurants in each neighborhood of New York.
  + Data source: Foursquare API
  + Description: By using this API we will get all the venues in each neighborhood. We can filter these venues to get only Indian restaurants.
* GeoSpace data
  + Data source: <https://data.cityofnewyork.us/City-Government/Borough-Boundaries/tqmj-j8zm>
  + Description: By using this geo space data we will get the New York Borough boundaries that will help us visualize choropleth map.

**Methodology**

Firstly, we collect the data regarding New York city available at the mentioned site and then using FourSquare API we will find all venues for each neighborhood. We proceed to filter out all venues that are Indian restaurants.

Then, we find rating, tips and like count for each Indian Restaurants using FourSquare API. Using rating for each restaurant, we will sort that data. Finally, we visualize the ranking of neighborhoods using Folium.

**Analysis & Discussion**

We will import the required libraries for Python-

1. Pandas and Numpy for handling data
2. Request module for using FourSquare API
3. Geopy to get co-ordinates of City of New York
4. Folium to visualize the results on a map

It is to be noted that the ranking is purely on basis of rating of restaurants. Also, the accuracy of data depends entirely on the data provided by FourSquare.

**Conclusion**

* Astoria(Queens), Blissville(Queens), Civic Center(Manhattan) are some of the best neighborhoods for Indian cuisine.
* Manhattan has potential Indian restaurant market.
* Staten Island ranks last in average rating of Indian restaurants.
* Manhattan is the best place to stay if you prefer Indian cuisine.