Applied Data science Capstone

Battle of Neighbourhood
(Toronto City)

Introduction

People always love to travel across the world. When we go to different cities we are in search of different things like shopping, hotels, restaurants, etc. Different peoples have different choice to select things according to their needs. So select neighbourhood according our need is very difficult Indian people loves their food. Everywhere they went, they are in search of Indian restaurant.

Toronto is the provincial capital of Ontario and the most popular city in Canada, with a population of 2,731,571 as of 2016. English is the predominant language spoken by Torontonians with approximately 95 per cent of residents having proficiency in the language, although only 54.7 per cent of Torontonians reported English as their mother tongue.

This project helps to find out Indian restaurant in Toronto city

Data

- Data source: https://en.wikipedia.org/wiki/List_of_postal_codes_of_Canada:_M

Description: Toronto data is obtained using BeautifulSoup web scraping

- Data source http://cocl.us/Geospatial_data

Description: Toronto location data i.e Longitude and Latitude can be obtained

We obtained Neighbourhood and associated venues information from Foursquare.

- GeoSpace data
  - Data source :Toronto.geojson
  - Description: By using this geo space data we will get the Toronto Borough boundaries that will help us visualize choropleth map.

Steps

1.By using BeautifulSoup web data extracted from the following site

https://en.wikipedia.org/wiki/List_of_postal_codes_of_Canada:_M

This contains only postal codes, Borough, Neighbourhood

2.To add longitude and latitude following link is used and it merged with previous data frame on postal code attribute

http://cocl.us/Geospatial_data

3.By using Foursquare API neighbourhood and venue information can be obtained.

4.Venue information filtered out for Indian restaurants

5.Find rating, tips and like count for each Indian Resturants using FourSquare API.

6.Using rating for each restaurant, we will sort that data.

7.Visualize the Ranking of neighbourhoods using folium library

Figure: a)No. of Indian restaurant Borough wise

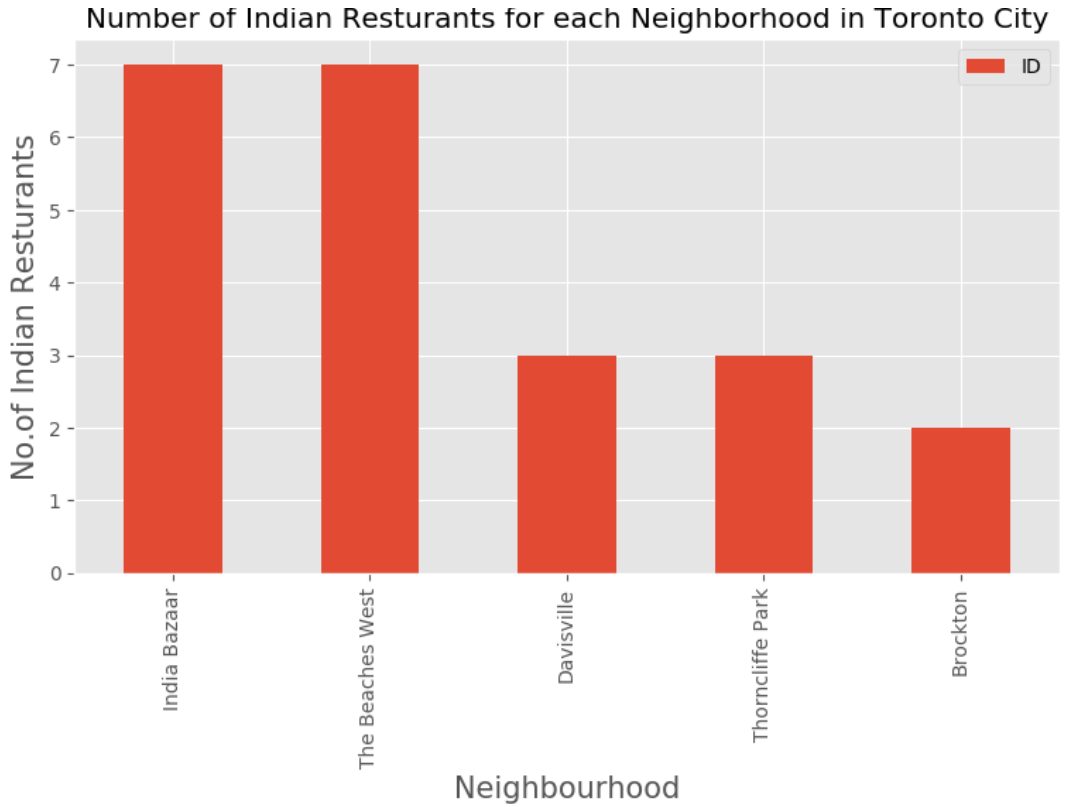


Figure: b)No. of Indian restaurant Neighbourhood wise

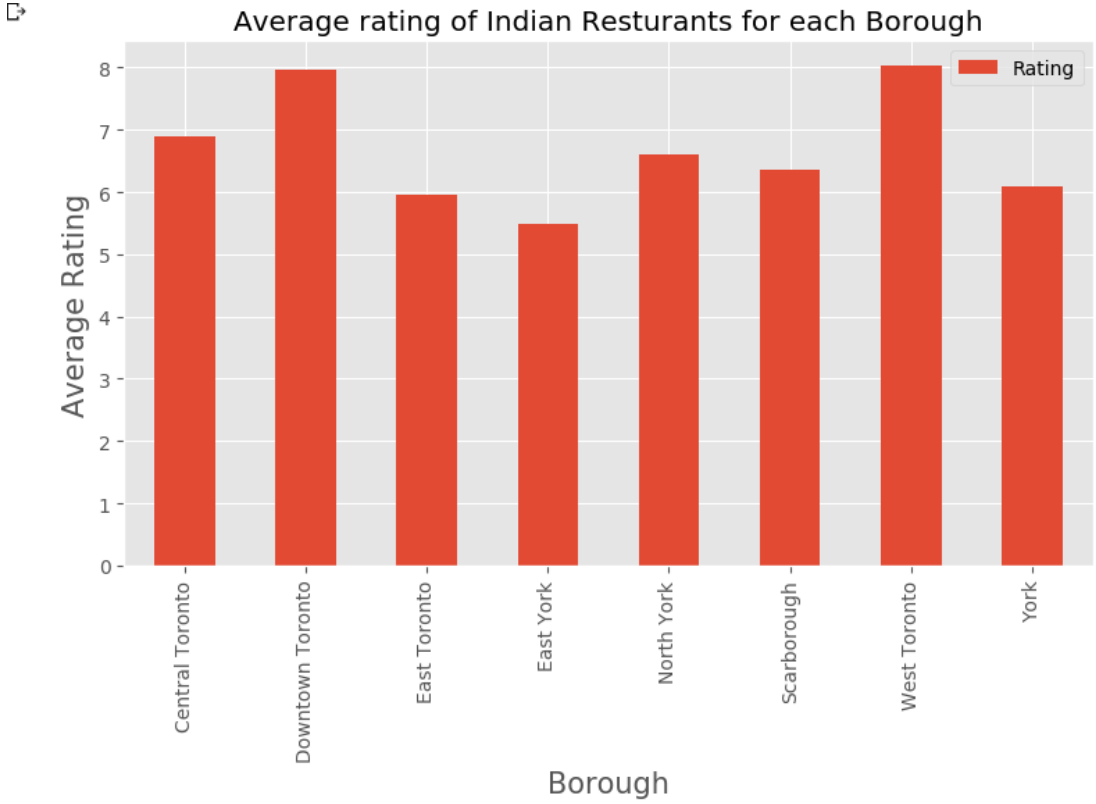
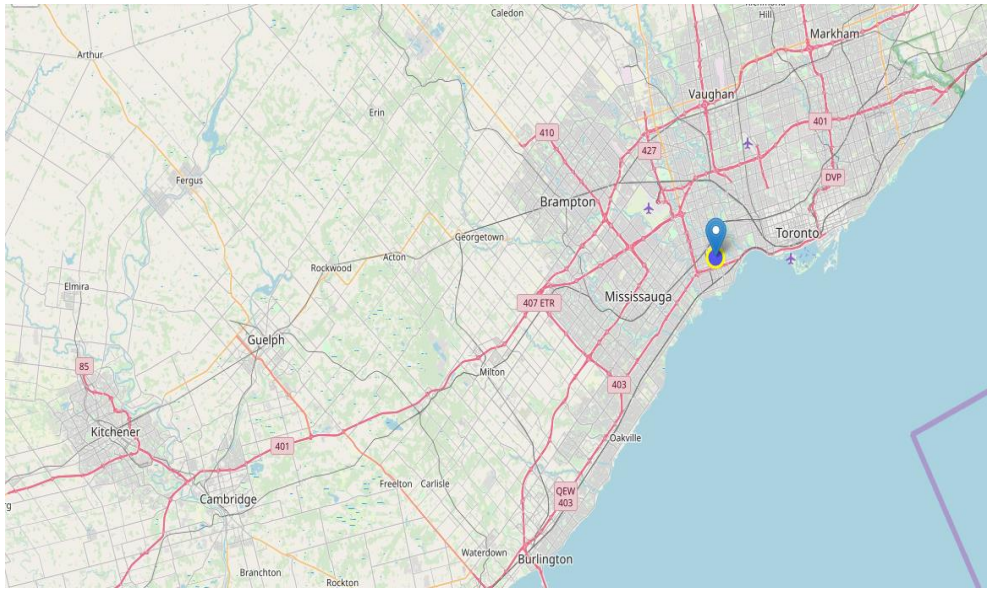
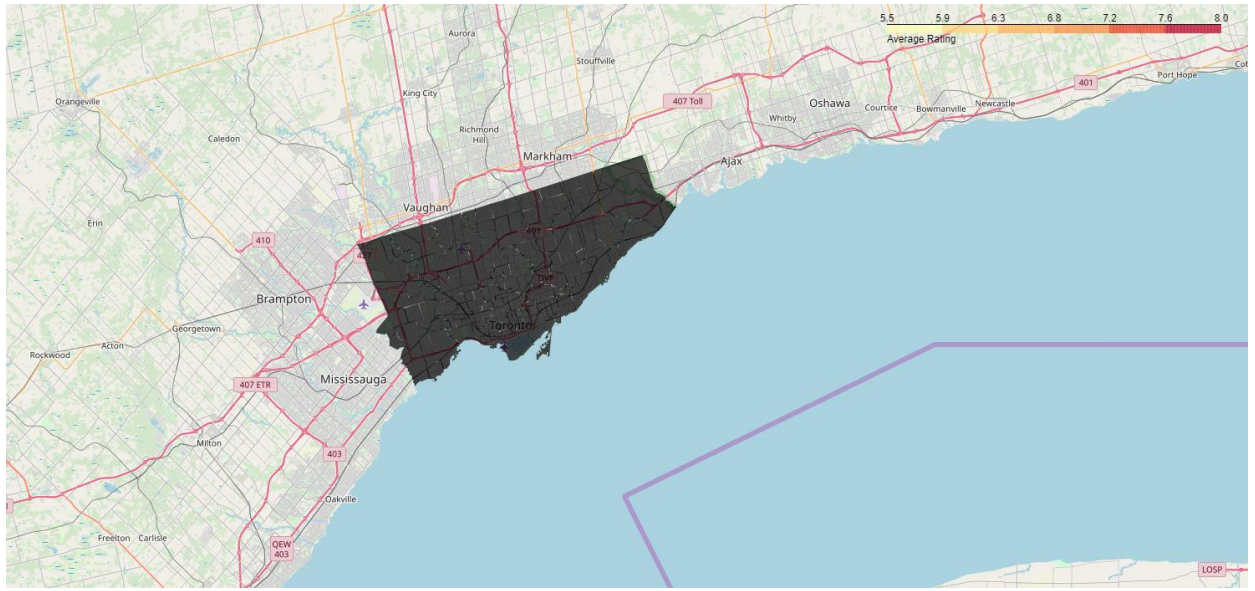


Figure: Average rating of restaurants Borough wise



Maps to show Toronto city location



Map to show rating and boundries

Conclusion

- West Toronto, Downtown Toronto, Central Toronto, North York, Scarborough are the good place for Indian food.
- South of Bloor is having potential market for Indian food
- East York last in average rating of Indian Restaurants.

Limitations

Accuracy depends on the data provided by FourSquare