

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 Restaurants using FourSquare API.
6. Using rating for each restaurant, we will sort that data.
7. Visualize the Ranking of neighbourhoods using folium library

Questions that can be asked using the above mentioned datasets

- What is best location in Toronto for Indian food?
- Which areas have potential Indian Restaurant Market?
- Which all areas lack Indian Restaurants?

Analysis

We will import the required libraries for python.

- pandas and numpy for handling data.
- request module for using FourSquare API.
- geopy to get co-ordinates of City of Toronto
- folium to visualize the results on a map

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