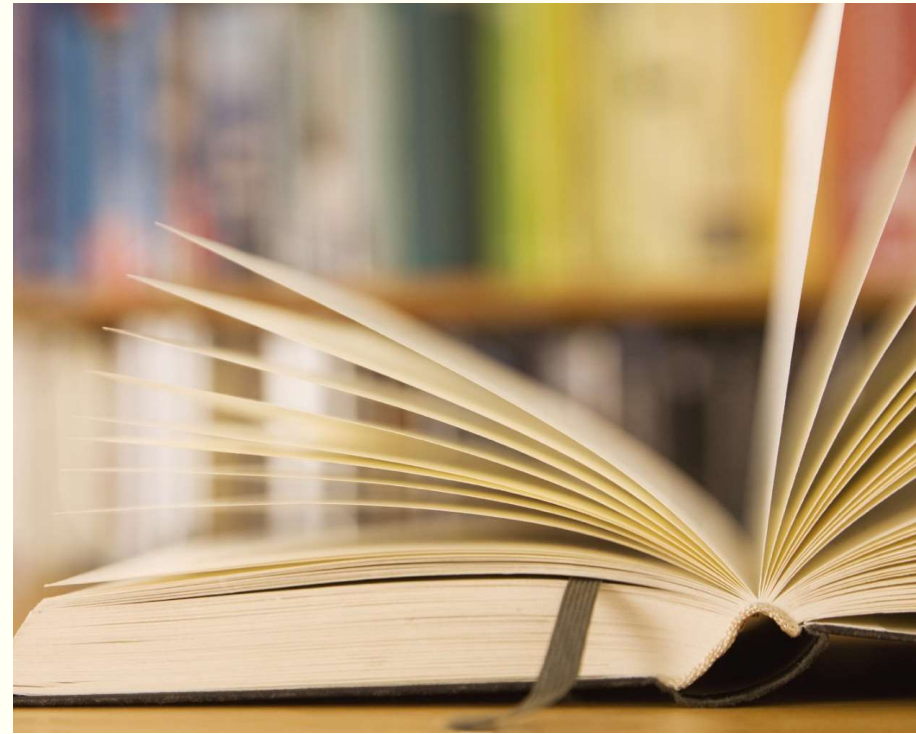# ANALYZING FOOD QUALITY AND CULTURE IN INDIAN CITIES

Sandeep A. Thorat

Introduction

- India has diverse food culture

- Need to have proper information about best restaurants in the city and cushions available there

- Zomato Kaggle Dataset is useful for above purpose

Questions to be Answered

1.   Find cumulative number of restaurants in each City of India.

2.   Focus on the City having maximum Restaurants (in this case it is New Delhi)

3.   Show restaurant clusters from Delhi using folium maps. Use k-means for clustering.

4.   Find out 5 places from New Delhi which have best restaurant.

5.   Find out New Delhi's 5 worst places for eating

6.   Find out top 5 localities of New Delhi having maximum and minimum number of Restaurants

7.   Find best places for Chinese restaurant in New Delhi city

8.   Group and summarize the data based on localities in New Delhi

Source of Data

➢ Zomato kaggle dataset that contains list of Indian cities, Localities, Restaurant names, Ratings.

Data source : Zomato kaggel dataset

Description : This data set contains the required information. And we will use this data set to explore various cities of India.

➢Foursquare Places API.

Data source : Fousquare API

Description : The Foursquare Places API provides location based experiences with diverse information about venues, users, photos, and check-ins. The API supports real time access to places, Snap-to-Place that assigns users to specific locations, and Geo-tag.

Data Pre-processing Tasks

- Remove the unwanted columns and rows from dataset

- Following attributes are considered as important and all remaining attributes are discarded : 'Restaurant Name', 'City', 'Locality', 'Longitude', 'Latitude', 'Cuisines', 'Aggregate rating', 'Rating text', 'Votes'

- Remove all records which have incorrect Longitude value (i.e. 0.0)

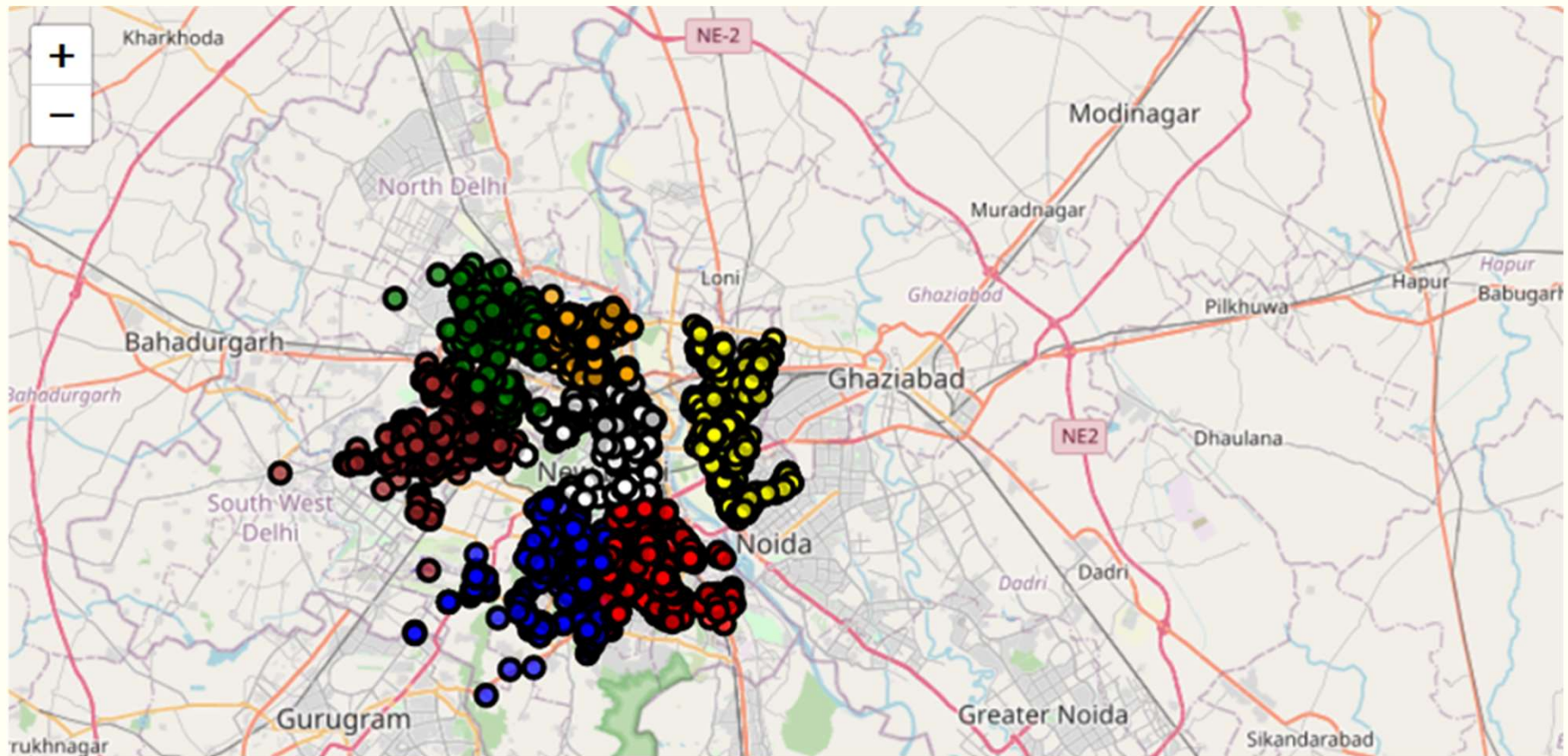- Remove Restaurants having aggregate rating 0.0

Exploratory Data Analysis Method

- Collect the Indian restaurant's data from Zomato kaggel dataset

- Perform data pre-processing to remove unnecessary fields from the dataset

- Use FourSquare API to find all venues for each city.

- Answer Questions of interest using data analytics appraoch.

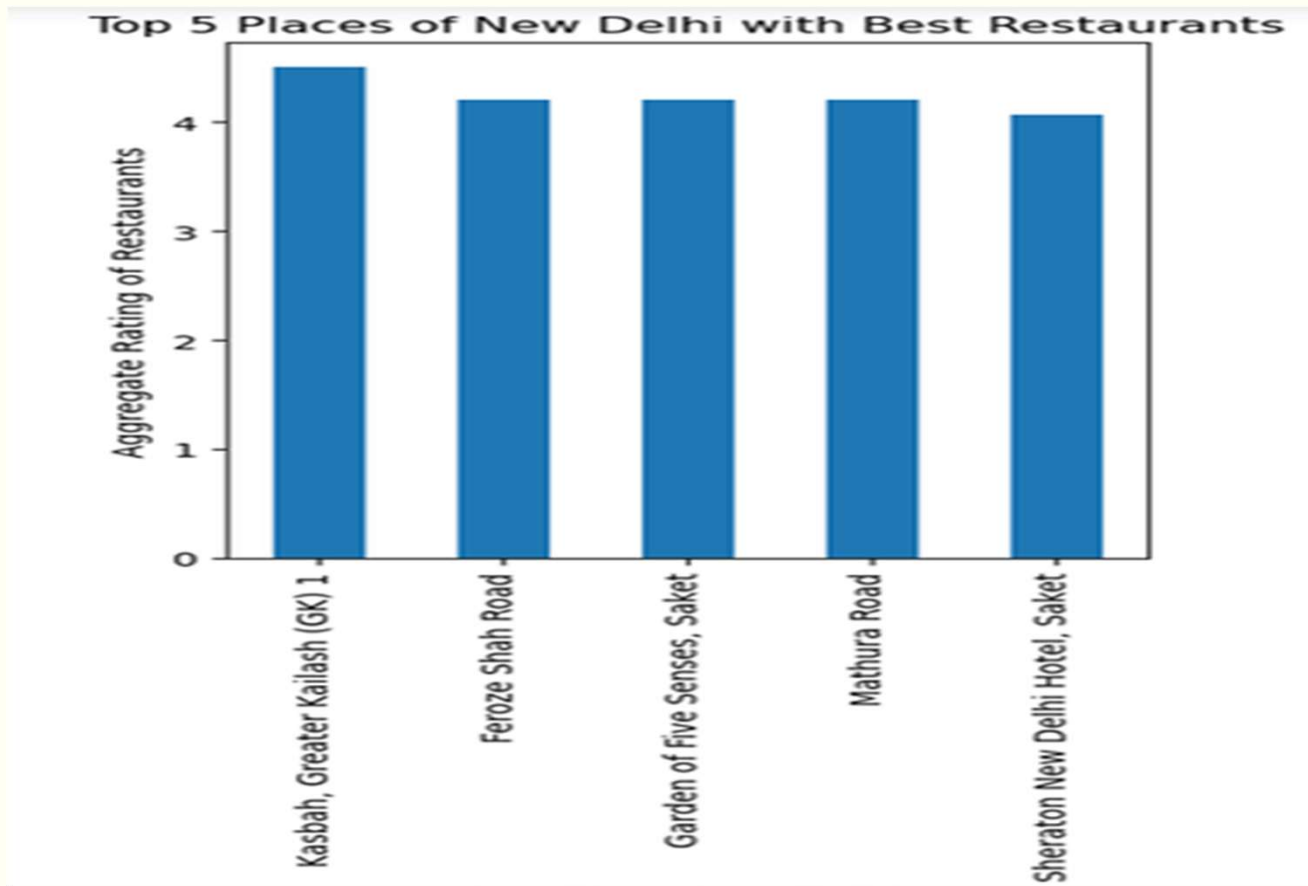- Visualize the results using different libraries in Python

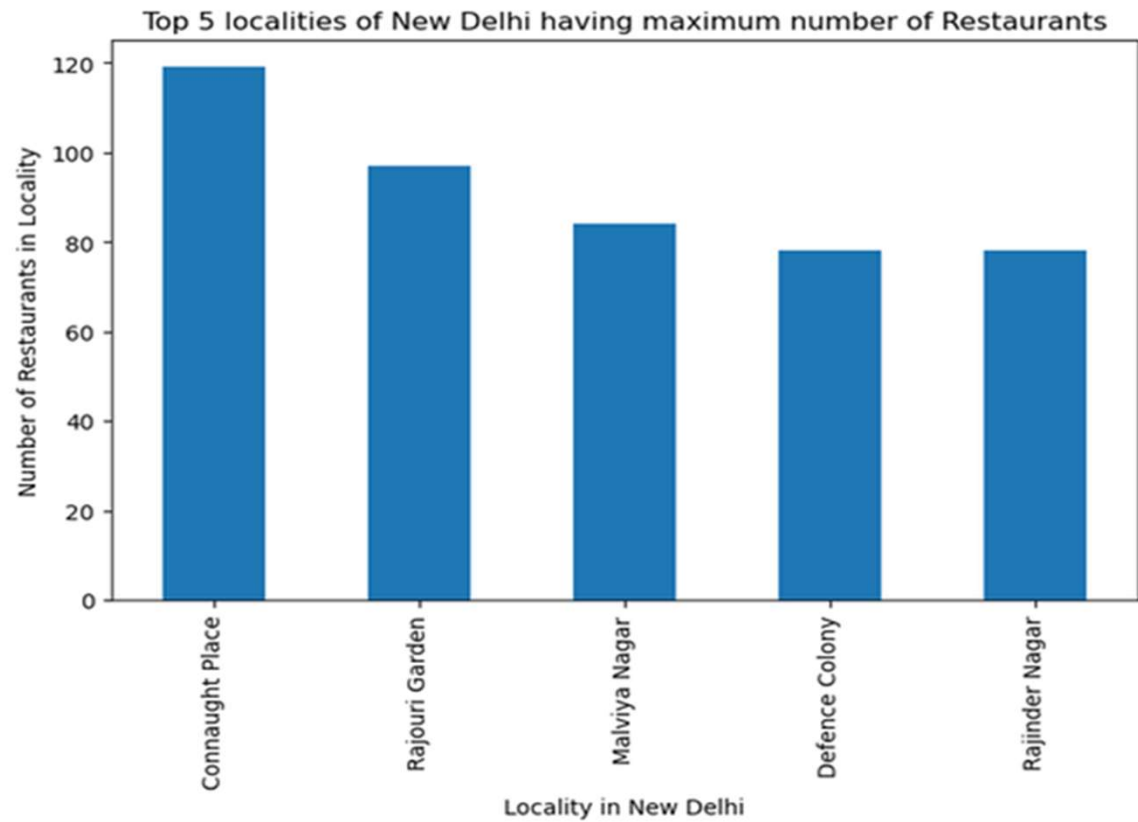# Restaurant Cluster in New Delhi

Exploratory Data Analysis

Top 5 Places of New Delhi with Best Restaurants

Exploratory Data Analysis

The Worst 5 localities of New Delhi for Eating

Exploratory Data Analysis

Top 5 localities of New Delhi having maximum number of Restaurants

Exploratory Data Analysis

The best Locality for chinese restaurant in New Delhi city
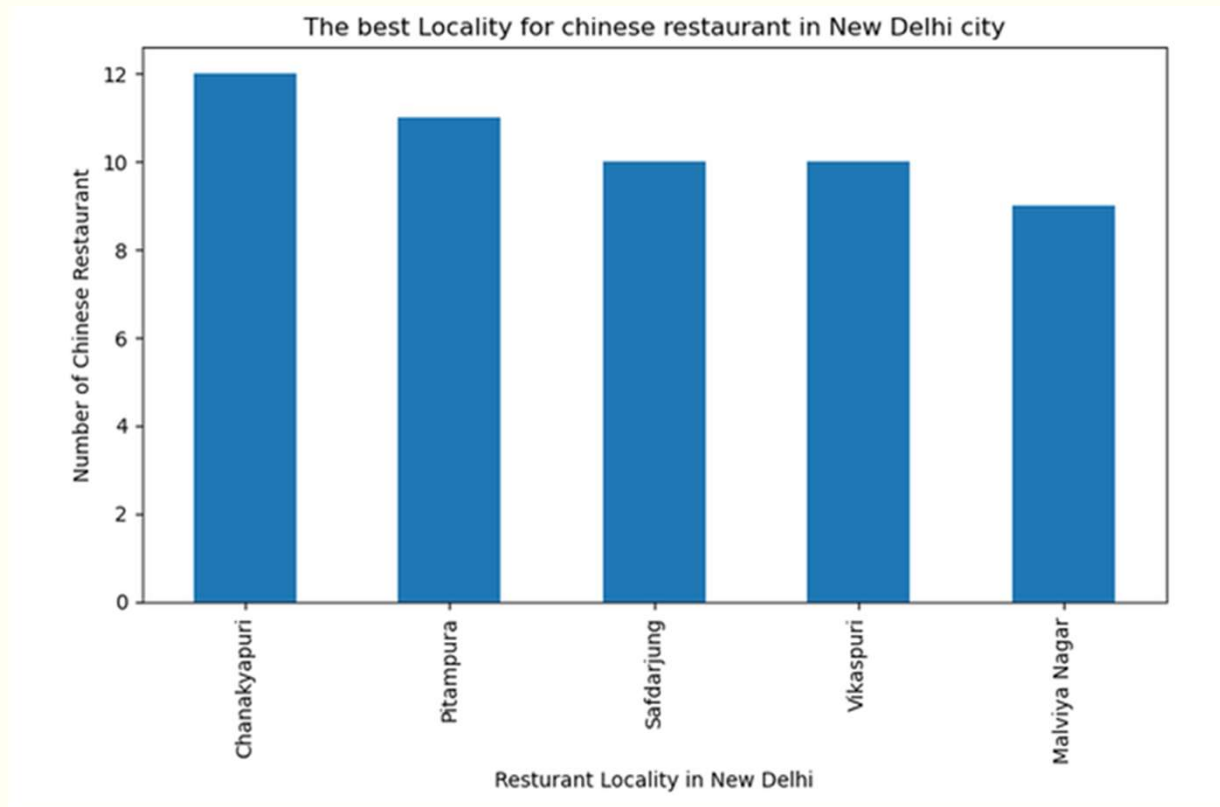
Exploratory Data Analysis

	Locality	Locality Latitude	Locality Longitude	Venue	Venue Latitude	Venue Longitude	Venue Category
0	ARSS Mall, Paschim Vihar	28.668945	77.101544	Subway	28.669999	77.102546	Sandwich Place
1	ARSS Mall, Paschim Vihar	28.668945	77.101544	Pizza Hut	28.670321	77.103853	Pizza Place
2	ARSS Mall, Paschim Vihar	28.668945	77.101544	Café Coffee Day	28.670009	77.102480	Coffee Shop
3	ARSS Mall, Paschim Vihar	28.668945	77.101544	Baljeet's Amritsari Koolcha	28.665768	77.100481	Indian Restaurant
4	ARSS Mall, Paschim Vihar	28.668945	77.101544	Little Chef	28.670000	77.101459	Chinese Restaurant

Conclusions

1) Kasbha Greater Kailas is the best place for eating in New Delhi

2) Picadially Hotel, Janakpuri is the worst place for eating in New Delhi.

3) The Connaghut have maximum number of restaurants.

4) Chanakyapuri is the best place for Chinese cushions.

5) In ARSS Mall, Pashim Vihar the Subway venue is best for eating sandwich.

!!!THANK YOU!!!