1-Introduction

1-1 Problem background

New York City (NYC), often called New York (NY), is the most populous city in the United States. With an estimated 2019 population of 8,336,817 distributed over about 302.6 square miles (784 km2), New York is also the most densely populated major city in the United States. Situated on one of the world's largest natural harbors, New York City is composed of five boroughs and 306 neighborhoods, each of which is a county of the State of New York. The five borough are Brooklyn, Queens, Manhattan, the Bronx, and Staten Island.

New York City is also considered as a global hub of business and commerce, as a center for banking and finance, retailing, world trade, transportation, tourism, real estate, new media, traditional media, advertising, legal services, accountancy, insurance, theater, fashion, and the arts in the United States

As many as 800 languages are spoken in New York City, making it the most linguistically diverse city in the world. New York is home to more than 3.2 million residents born outside the United States, the largest foreign-born population of any city in the world as of 2016. As a result of city's immigrant history It's food culture includes a variety of international cuisines.

In order to start a new Turkish restaurant in New York City we need to analyze restaurants business environment carefully. The insights derived from our analysis will give good understanding of restaurants business environment in New York City and this will have a major effect on reduce risk of investment and increase Return of Investment (RoI) in this highly competitive market.

1-2 Problem Description

Choosing a location for a new restaurant is one of just a few keys to profitability. There are several factors should be considered when choosing a location for new Turkish restaurant:

- 1- Type of selected area for new restaurant (business areas or residential area)
- 2- Population density: Are there enough people in the selected area to support the business? There need to be enough people who live in or pass through the area regularly to keep the business busy.
- 3- People activity periods in that area (i.e. business area from 9 AM to 5 PM or touristic area can be visited any time of the day)
- 4- Entertainment facilities (cinema, theater, shopping malls, park, garden and playground)
- 5- Transportation
- 6- Competitors in selected location
- 7- Cuisine of the competitors

1-3 Success Criteria

The project aims to select the best location for a new Turkish restaurant in New York City. The selection criteria based on selecting one borough form 5 boroughs in New York City and then explore the neighborhoods of the selected borough to find the most 10 common Venus in each neighborhoods and finely clustering the neighborhoods use the k-means clustering algorithm. After neighborhoods clustering the clusters are explored to select the best cluster as a location for the new Turkish restaurant.