

Coursera Capstone – The battle of Neighborhoods

Mediterranean Restaurant in Toronto

Problem Background

This project is a hypothesis for an entrepreneur who would like to open a new business (a Mediterranean restaurant) in the capital city of Canada, Toronto, and would like to search for a suitable neighborhood for such kind of restaurant.

This entrepreneur would like to avoid strong competition as he/she is new to the business by targeting a neighborhood with no or little number of Mediterranean restaurants!

Problem Description

The objective of this capstone project is to use both location-based API like Foursquare API, Data Science methods and Machine Learning Algorithms to help a new entrepreneur in finding an appropriate neighborhood with no or little Mediterranean restaurants to open a new Mediterranean restaurant. This project aims to answer the following question: If a new entrepreneur would like to open a new Mediterranean restaurant in Toronto and avoid strong competition with other restaurants of the same type, in which neighborhood he/she should consider opening it?

Data Description

This project requires exploring, segmenting and clustering neighborhoods of Toronto city.

Two main data sources were used in this project:

1. Scrapping the following Wikipedia page to get needed information about different neighborhoods of Toronto:
https://en.wikipedia.org/wiki/List_of_postal_codes_of_Canada:_M
This Wikipedia page provides an html table with the list of postal codes along with boroughs and neighborhoods of Toronto city.
2. Foursquare API to get more info about venues of each neighborhood in Toronto such as name, location and categories