



YOUR BAGEL SHOP In Manhattan, NY

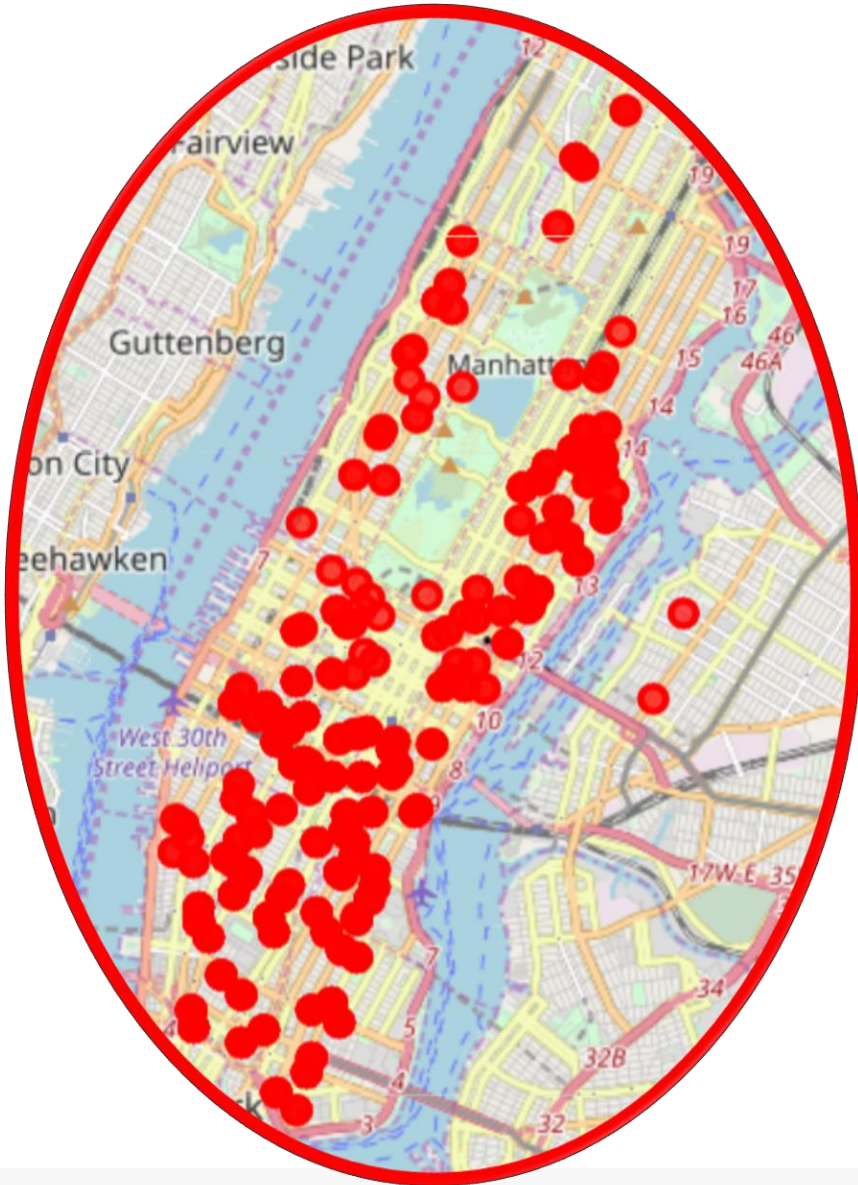
INVESTOR OPPORTUNITY

OUR BIG IDEA

Your Bagel Shop's mission is to become the recognized leader in its target market for providing an outstanding selection of Bagel.



BAGEL LANDSCAPE



- Currently there are 500+ different type of Bagel Shops in and around Manhattan
- Bagel Category includes around 15 unique categories including Bagel Shop, Coffee Shop, Café, Gourmet Shop etc.
- New York has around 300+ neighbourhoods, off which 40 belong with Manhattan
- **Where should we open Bagel Shop to have higher rate of success?**

Data Acquisition

NEIGHBOURHOOD DATA

Source : https://geo.nyu.edu/catalog/nyu_2451_34572,

Out of Total 306 neighbourhoods, 40 belonged to Manhattan

Cleanse

Manhattan
Neighbourhood
Dataframe

	Borough	Neighborhood	Latitude	Longitude
0	Manhattan	Marble Hill	40.876551	-73.910660
1	Manhattan	Chinatown	40.715618	-73.994279
2	Manhattan	Washington Heights	40.851903	-73.936900
3	Manhattan	Inwood	40.867684	-73.921210
4	Manhattan	Hamilton Heights	40.823604	-73.949688

VENUE DATA for BAGEL

Source : <https://api.foursquare.com/v2/venues/search....>

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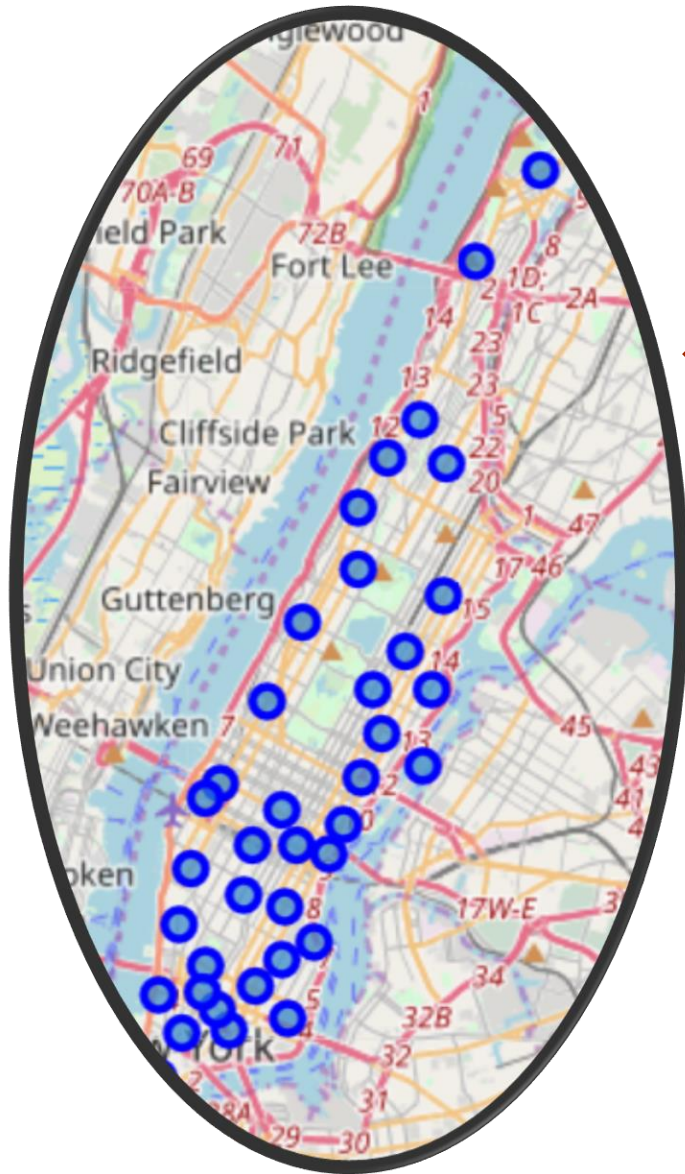
Bagel Category
Venue
Dataframe

for bagel_category = '4bf58dd8d48988d179941735'

Total 575 Venues

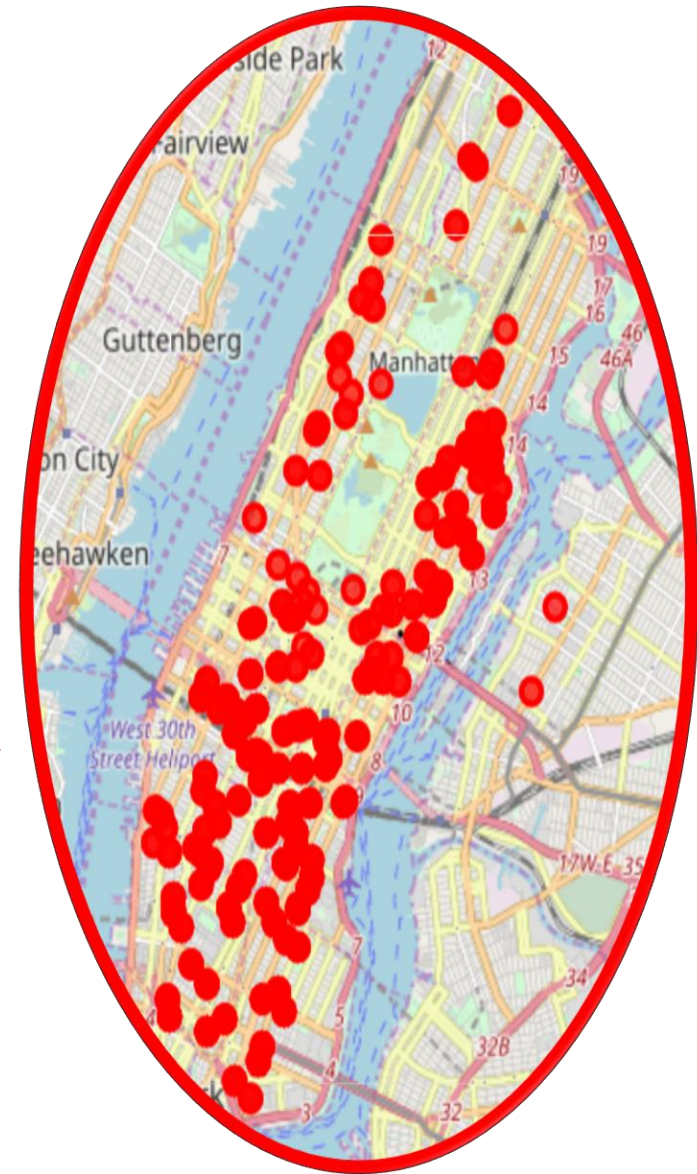
	Neighborhood	Neighborhood Latitude	Neighborhood Longitude	Venue	Venue Latitude	Venue Longitude	Venue Category
0	Marble Hill	40.876551	-73.91066	Cafeccino Bakery	40.880068	-73.907064	Bagel Shop
1	Marble Hill	40.876551	-73.91066	Token Bagel	40.885722	-73.910055	Bagel Shop
2	Marble Hill	40.876551	-73.91066	Gold Mine Cafe	40.878916	-73.904698	Café
3	Marble Hill	40.876551	-73.91066	Bagel Corner	40.885895	-73.910959	Bagel Shop
4	Marble Hill	40.876551	-73.91066	Mr. Bagel	40.880395	-73.903268	Bagel Shop

Data Visualizations using Folium



Neighbourhood
Spread

Venues Distribution



K-cluster : Clustering data based on Bagel Shop occurrence in distribution and mapping it back to Neighborhood



- Cluster 0: Neighbourhoods with moderate number of Bagel Shop

2nd Recommendation

- Cluster 1: Neighbourhoods with low number of Bagel Shop

1st Recommendation

- Cluster 2: Neighbourhoods with high concentration of Bagel Shop – **STAY AWAY!**

Conclusion and future directions

- ✓ **Build a model to predict which location is best suited for BAGEL SHOP given current distribution of VENUES across NEIGHBOURHOOD**

K-cluster method was used to find cluster within Venue Data based on frequency of occurrence of BAGEL SHOP

- ✓ **Accuracy of Model has room for improvement**

For current model, only 1 feature is used (venue distribution), other factors such as time of day, population, taste and preferences, population type, area type will also influence the outcome of the model. More features = Better Prediction

- ✓ **Data Quality**

The data used for prediction can be improved with current data, plus using professional grade data

THANK YOU!

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