IBM DATA SCIENCE CAPSTONE

STARTING A NEW FAST FOOD CHAIN IN PUNE

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BUSINESS PROBLEM

- In this project we will analyze the neighborhoods in Pune to help a fast food chain, looking to enter Pune, formulate a strategy.
- We will be targeting mainly fast food restaurants and snack bars since they usually cater to a similar target audience.
- This will help the fast food chain by giving them an idea about which locations are dense in population belonging to this demographic. This will ensure a high foot-traffic and help boost visibility and sales.

DATA

- Data Required:
  - List of neighborhoods in Pune
  - Geographical coordinates of neighborhoods
  - List of restaurants and snack bars in the neighborhoods

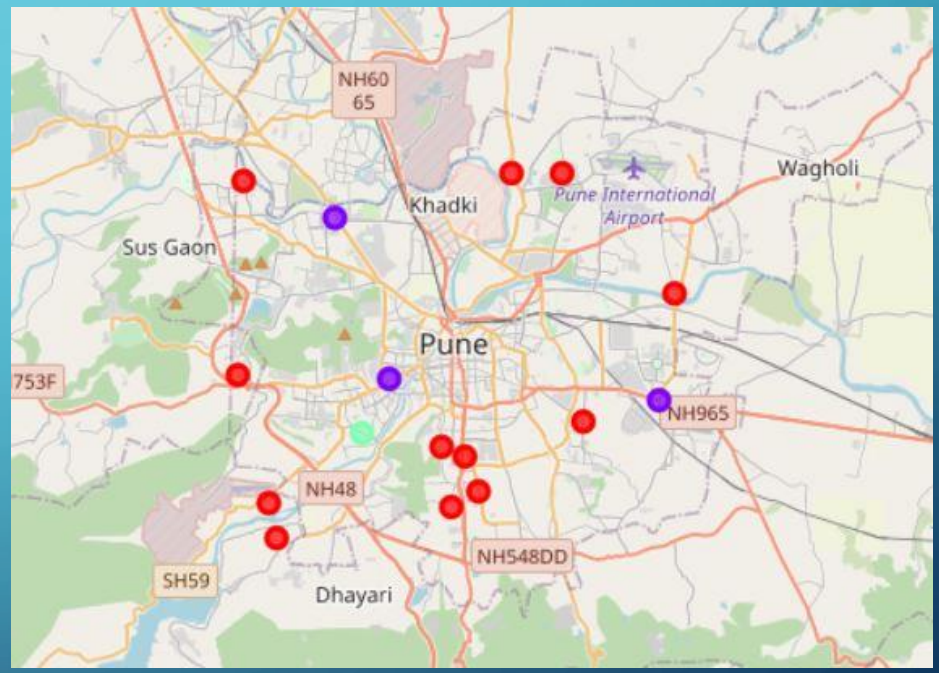
- Data Sources:
  - Wikipedia- To get the data regarding neighborhoods in Pune.
  - Python geolocation library: To get the coordinates of all the locations.
  - Foursquare API: To explore the neighborhoods and get a list of restaurants, snack bars and fast food outlets.

METHODOLOGY

- Web scraping Wikipedia page to get list of neighborhoods.
- Getting geographical coordinates of those areas using python geocoder package.
- Exploring those neighborhoods using Foursquare API to get data about snack bars and fast food restaurants.
- Dividing these neighborhoods into clusters to make analysis easier.
- Visualizing these clusters using folium.

RESULTS

- Divide the neighborhoods into 3 clusters.
- Cluster 0: Neighborhoods with only one snack bar/fast food restaurant.
- Cluster 1: Neighborhoods with 3 snack bars/fast food restaurants.
- Cluster 2: Neighborhoods with 2 snack bars/fast food restaurants.



DISCUSSION

- From the observations it seems that the locations falling in the first cluster will be good locations to get started.
- Outlets opening in cluster 2 will face the highest amount of resistance from the already existing restaurants and snack bars.

CONCLUSION

- As mentioned previously locations in cluster 1 are the ideal locations to get started since they have only one fast food restaurant/snack bar.
- Once these outlets are able to capture some amount of market share they can start opening outlets in cluster 3 and then cluster 2 finally.