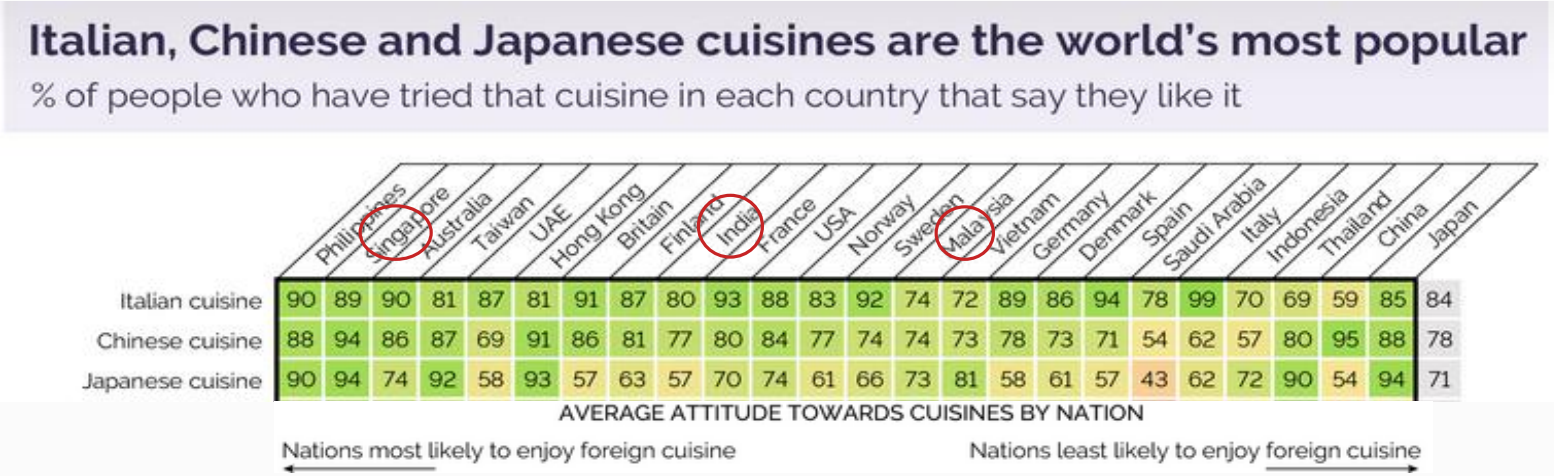
PROJECT CAPSTONE – FINDING ENTRY LOCATION FOR ITALIAN FOOD CHAIN IN ASIA

Business Challenge

One of Italian food chain (XYZ) is looking for expansion in Asian region specifically in South East Asia. Currently, management team is looking into different aspects such as how many Italian restaurants are already running & how are they performing. XYZ will consider 2 or 3 cities in phase-1 & subsequently will consider as much as in another 5 years.

For initial study, XYZ is looking for geo-wise analysis in such a way that they can shortlist some of cities for budgetary approvals & start looking for infra in at-least one city. Overall, vision is to start operations in at-least 2 cities before the end of this year.

Key locations & Data Sources



Source: https://yougov.co.uk/topics/food/articles-reports/2019/03/12/italian-cuisine-worlds-most-popular

In my analysis, I will be considering Singapore (One from top), Mumbai & Bangalore (two from mid segment), Jakarta (one from lower segment) as key locations because of major business presence & thus driving cross-continent food habits. I will consider foursquare APIs to search key venues, & specific Italian restaurant. Some of APIs to be used are as follows:

1) Extract all key venues in a radius parameter of 6000:
https://api.foursquare.com/v2/venues/explore?client_id={}&client_secret={}&ll={}&v{}&limit=6000&radius=6000'

2) Extract all Italian venues:
https://api.foursquare.com/v2/venues/search?client_id={}&client_secret={}&ll={}&v={}&query=Italian&limit=6000&radius=6000'

3) Extract venue rating, tips related info:
https://api.foursquare.com/v2/venues/venue_id?{}?client_id={}&client_secret={}&v={}

Data cleaning & key features

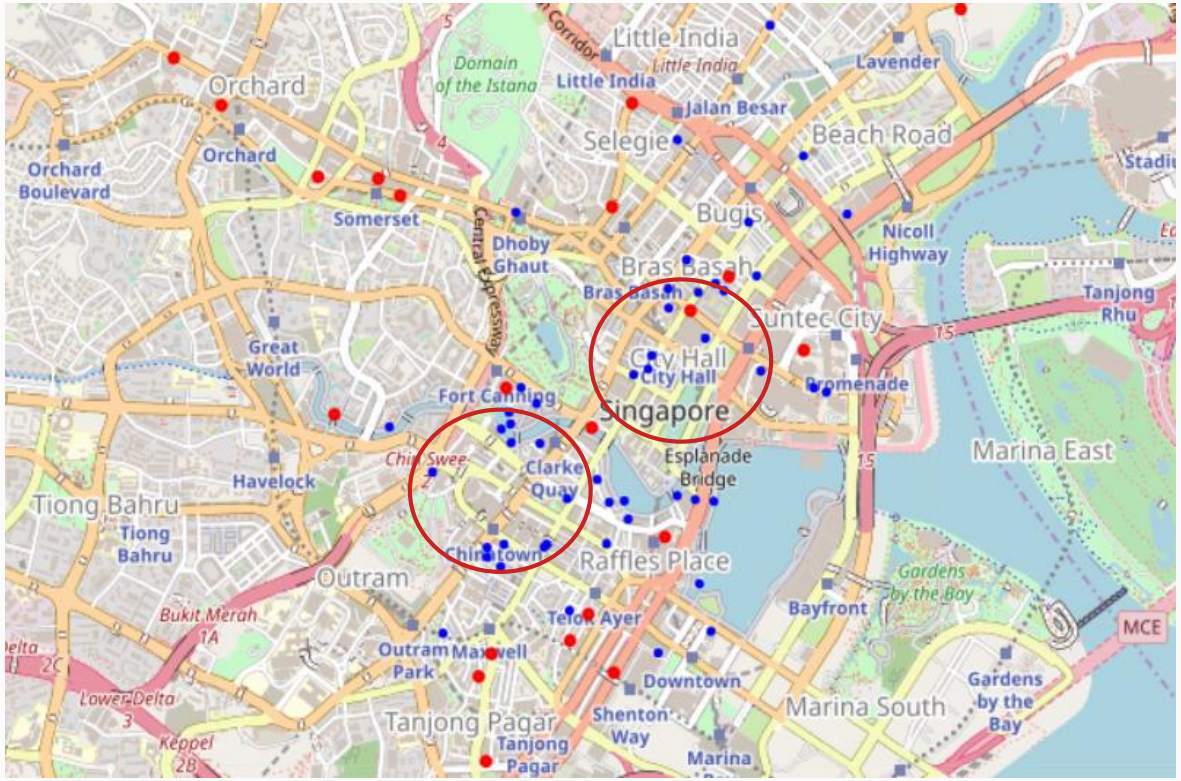
Looking into Foursquare API, responses will be in JSON format & with various redundant information. For our analysis, we will focus on **restaurant name, category, latitude & longitude, & address.**

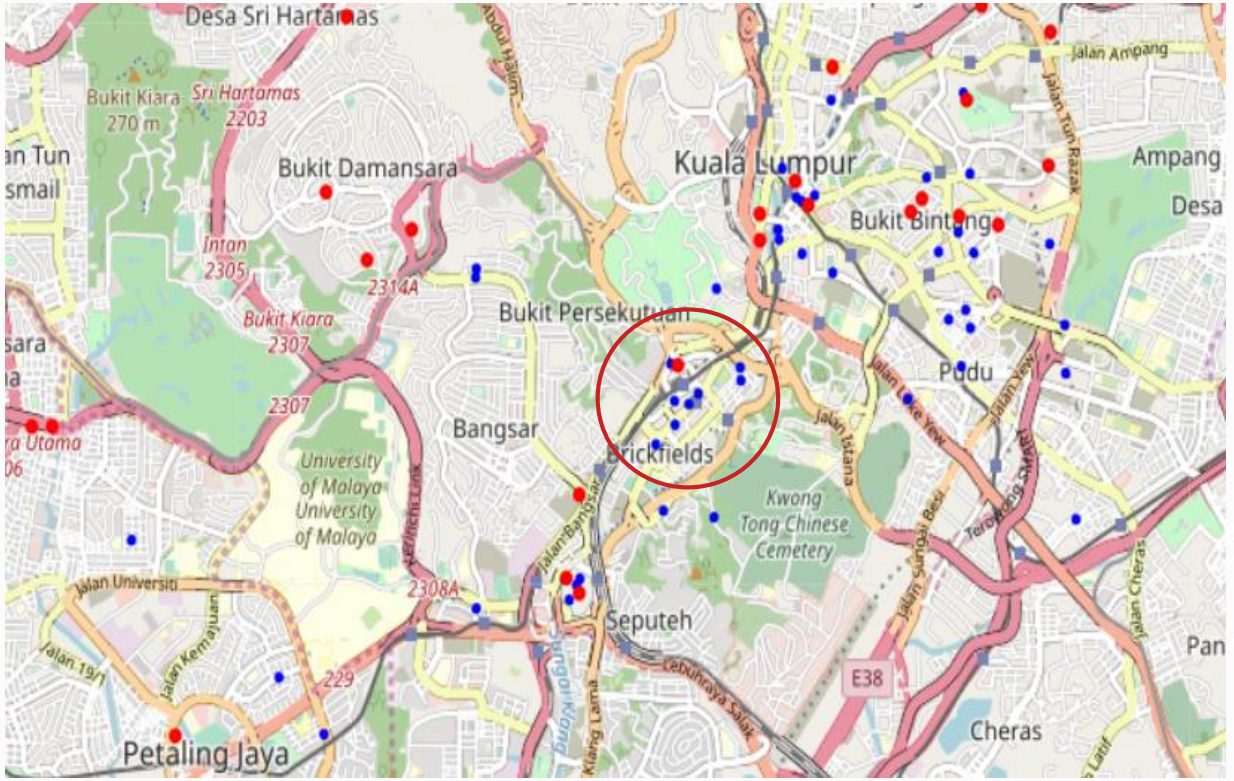
Same will be repeated twice per location: Extract all venues, & extract only Italian ones.

	name	categories	location.address	location.cc	location.city	location.country	location.crossStreet
0	Jumbo Seafood Restaurant	[{'id': '4bf58dd8d48988d1ce941735', 'name': 'S...	#01-01/02, Riverside Point	SG	Clarke Quay	Singapore	30 Merchant Rd
1	Tsui Wah Restaurant	[{'id': '58daa1558bbb0b01f18ec1d3',	#01-03 Clarke Quay	SG	Singapore	Singapore	3A River Valley Road

name	categories	address	cc	city	country	crossStreet	distance	formattedAddress	labeledLatLngs	lat	lng
Jumbo Seafood Restaurant	Seafood Restaurant	#01-01/02, Riverside Point	SG	Clarke Quay	Singapore	30 Merchant Rd	808	[#01-01/02, Riverside Point (30 Merchant Rd), ...	[{'label': 'display', 'lat': 1.288983, 'lng': ...	1.288983	103.844812

Analysis: Singapore & Kuala Lumpur

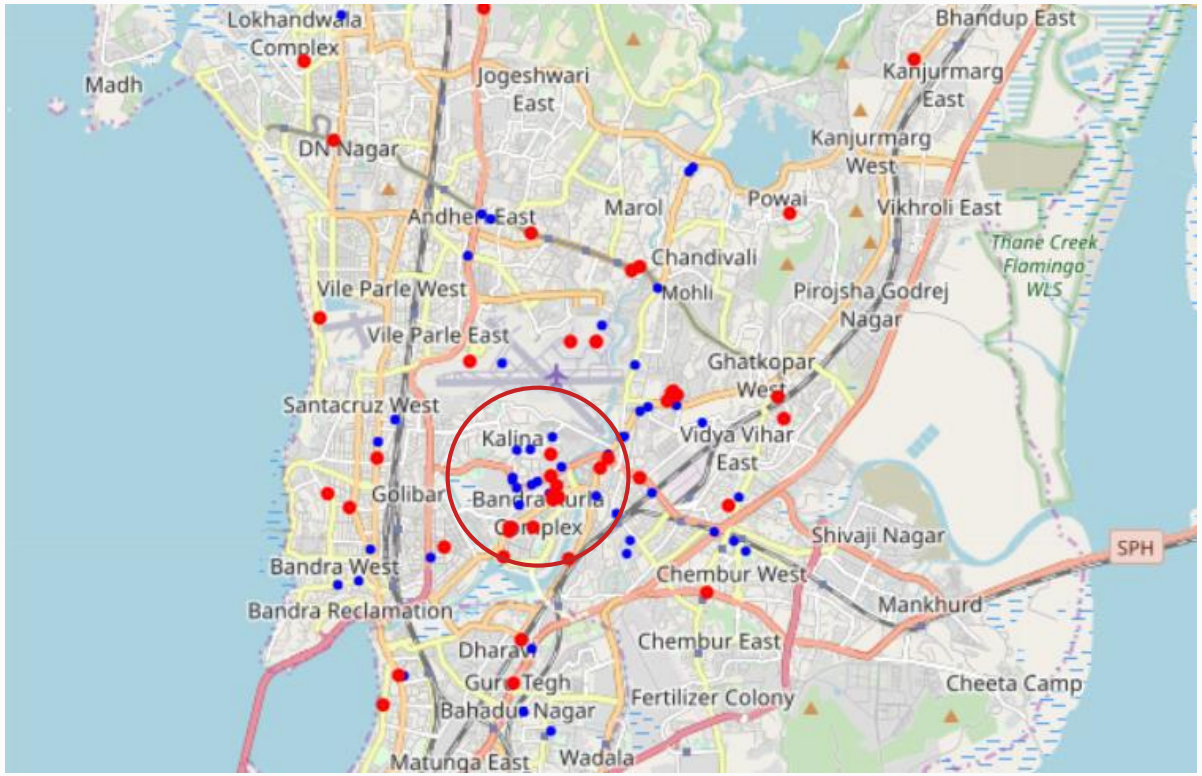




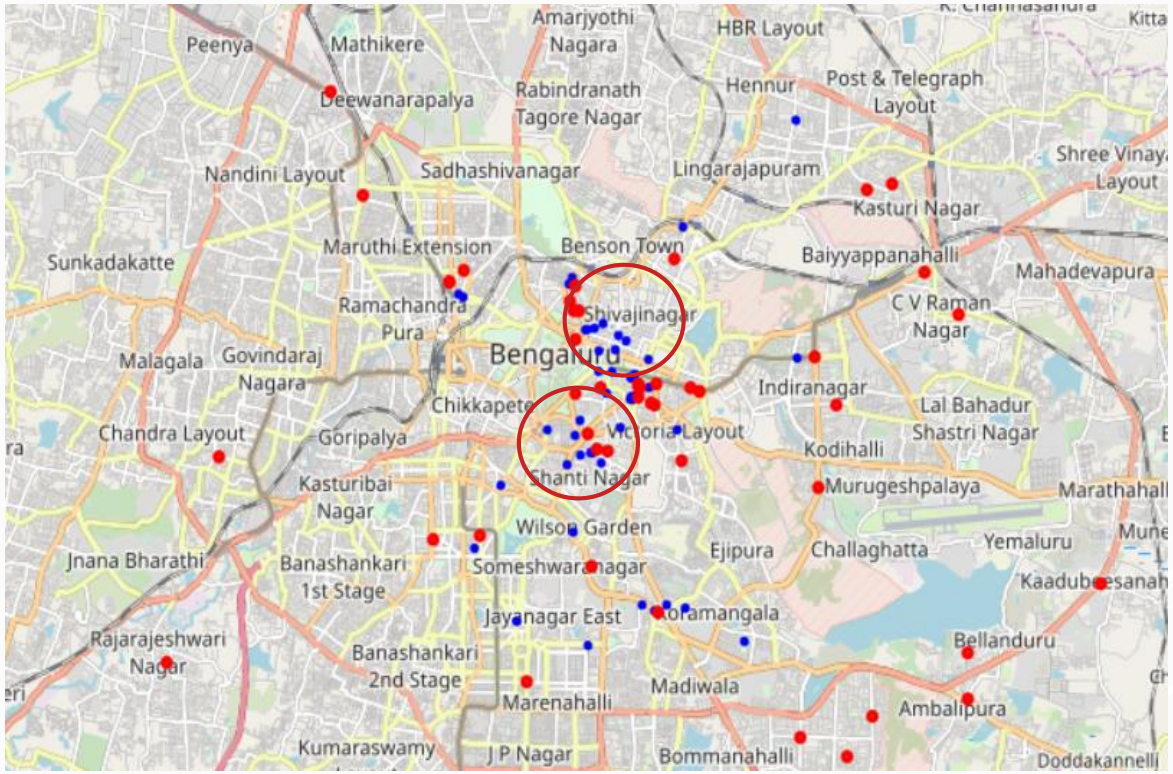
As can be seen above, there is good density of Italian restaurants across whole Singapore, however, there seems a patch of area near **China town** & **Clarke quay**, without any Italian restaurants. Similarly, it can be seen for **City hall**, but not as open as other two.

Same as Singapore, Jakarta also have plenty of Italian food restaurants. It can also be seen that areas such as **Brickfields** have just one Italian food restaurants and many for other cuisines. It can be one of location for new Italian food restaurant.

Analysis: Mumbai & Bangalore



Considering the density above, it seems all places have equal or good mix of Italian food restaurants (**Bandra**, **Chembur**). However, they may be catering to relevant segment - premium, mid or lower. Still, there will be risk & require further study into type of customers visiting into & average ticket size.



Similar to Mumbai, there seems good mix of restaurants serving Italian cuisine. There are some empty patches (**Shivajinagar**, **Shantinagar**), but still they seem crowded. There is huge demand for Italian food for sure.

Results & Discussion

- As we could see that based on existing density, clearly, Singapore & Kuala Lumpur have clear patches to start with phase 1. However, It could be due to lower density or demand, specifically in Kuala Lumpur. At the same time, Mumbai & Bangalore have reasonable density, therefore, possibility to gain some market share in shorter time frame but with affordable price range or looking more deeply to how existing food-chains are performing.
- In order to avoid the risk, consider Singapore & Bangalore as key locations for phase 1. First, open patches of Singapore will provide good place for growth & capture market share. Second, Bangalore have demand for Italian food, however, need to be specific in terms of price segment, as higher competition may not provide good grounds for healthy margin or even sales in first place.
- Now, lets analyze the some of restaurants for tips/ratings for Singapore & Bangalore.

```
[58]: # Italian restaurant rating in Singaplore
      url1 = 'https://api.foursquare.com/v2/venues/5993ed99356b497a3d3df414?clien
      result1 = requests.get(url1).json()
      try:
          print(result1['response']['venue']['rating'])
      except:
          print('This venue has not been rated yet.')
```

```
7.2
```

```
[57]: # Italian restaurant rating in Bangalore
      url1 = 'https://api.foursquare.com/v2/venues/4bc06339f8219c74087db110?clier
      result1 = requests.get(url1).json()
      try:
          print(result1['response']['venue']['rating'])
      except:
          print('This venue has not been rated yet.')
```

```
6.0
```

- Not all restaurants are rated, but some of them have more than average rating. It means there is acceptance or liking for Italian food & therefore, we may consider entering mentioned cities in initial phase.

Conclusion & Directions

- Based on my analysis, it can be seen that all cities have good acceptance however, I have recommended **Singapore** & **Bangalore** as first entry points in Asia.
- In order to be more specific in 2nd phase, additional information on customer demographics & income may be crucial.
- Tips related information will be good to include, but could not use the same due to free API restrictions by foursquare.
- Other two cities, Mumbai & Kuala Lumpur also have good potential, so shall be explored more in phase 2.