

The Battle of the Neighborhoods

Introduction

People all around the world know the Bronx as the home of the New York Yankees, the Bronx Zoo and the New York Botanical Garden—not to mention as the birthplace of hip-hop. Look deeper and you'll discover the quaint maritime village of City Island, the cultural attractions of Fordham and Belmont, aka the "real Little Italy," centered on the restaurants and cafés of Arthur Avenue. Grand Concourse, in the South Bronx, is full of art deco marvels.

The Problem

The Bronx Zoo is a zoo located within Bronx Park in the Bronx, a borough of New York City. It is one of the largest zoos in the United States by area, comprising 265 acres of park lands and naturalistic habitats separated by the Bronx River. On average, the zoo has 2.15 million visitors each year as of 2009. But occasionally, it can be overcrowded.

"Nice zoo but overcrowded with humans instead of animals. Zoo is conveniently located close to the westfarm subway station (Line 2 or 5). Plenty of shops/ice-cream vendors/marketplace near the zoo and hence plenty of choice for food before entering the zoo. Inside zoo the Bengal monorail ride was nice and thrilling with great sights. However animals were not much in sight esp lions and tigers. Peacocks/peafowls were nice and photogenic. On Wednesdays the place is overcrowded and perhaps why we felt it was too crowded. 4D show was nice and so was the Walking Trail" Quoted by Laks V.

Objective

To help people, especially foreign visitors, who are going for a family trip to the zoo or having a vacation in Bronx, New York City.

There are several zoos in Bronx, so this objective will allow people to know the name and location of the zoo. This objective will be based on the nearest zoo from Fordham which is one of the neighborhoods in Bronx.

Data

The data used for this analysis is a combination of a .json file that has been downloaded, together with the location information in foursquare.

The .json file will allow us to find out the location of each borough, its longitude and latitude. The information from foursquare will allow us to find out the location of the zoos in Bronx.

A map shows all the neighborhoods within the borough of Bronx. Neighborhoods such as Wakefield, Fordham, Eastchester, etc...

Foursquare API was used to explore nearby venues around one of the chosen neighborhood, Fordham.

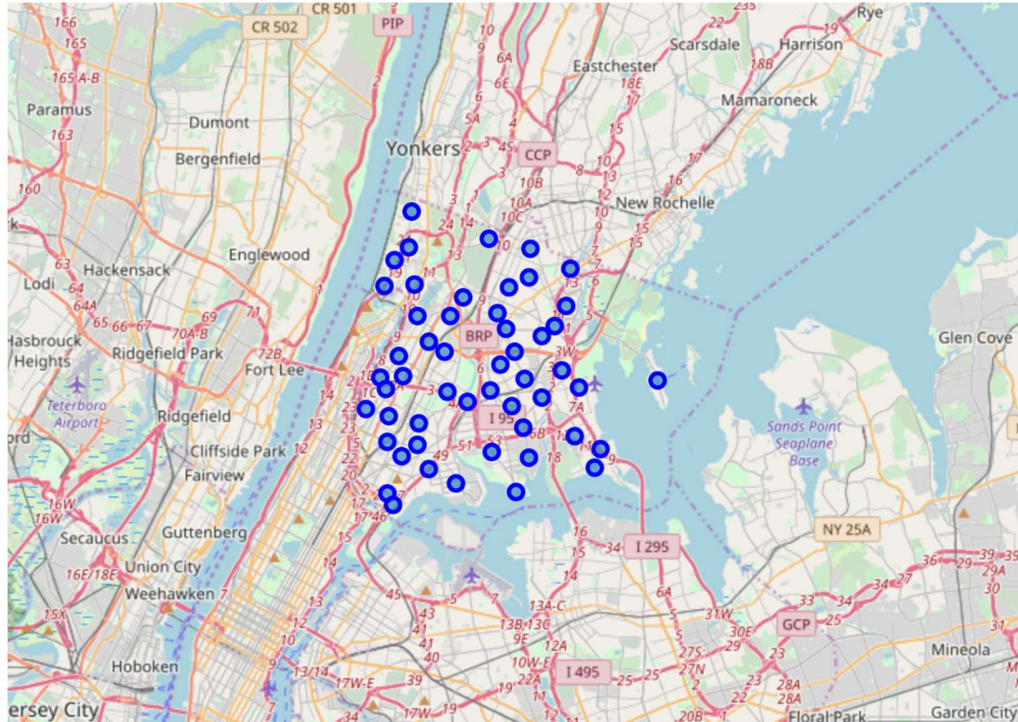
Methodology

1. Loading each data set
2. Wrangle and sort data set
3. Find out the longitude and latitude of each neighborhood
4. Pin markers to each individual neighborhood
5. Using Foursquare API Identify 100 venues closest to one of the neighborhood, Fordham
6. List out the name and location of the zoo within 3km radius from Fordham

Results

| | Borough | Neighborhood | Latitude | Longitude |
|---|---------|--------------|-----------|------------|
| 0 | Bronx | Wakefield | 40.894705 | -73.847201 |
| 1 | Bronx | Co-op City | 40.874294 | -73.829939 |
| 2 | Bronx | Eastchester | 40.887556 | -73.827806 |
| 3 | Bronx | Fieldston | 40.895437 | -73.905643 |
| 4 | Bronx | Riverdale | 40.890834 | -73.912585 |
| 5 | Bronx | Kingsbridge | 40.881687 | -73.902818 |
| 6 | Bronx | Woodlawn | 40.898273 | -73.867315 |
| 7 | Bronx | Norwood | 40.877224 | -73.879391 |

1. With the loaded data, we zoomed right into Bronx because our focus is in Bronx and the neighborhoods together with their longitude and latitude were shown as the appeared table.



- Markers were pin onto the different neighborhoods with the longitude and latitude provided in the data table and this map gives us a clearer view of where each neighborhood are located.

| | name | categories | lat | lng |
|----|----------------------|------------|-----------|------------|
| 64 | Bronx Zoo | Zoo | 40.853107 | -73.878094 |
| 65 | Sea Lion Pool | Zoo | 40.852882 | -73.878545 |
| 69 | Children's Zoo | Zoo | 40.851826 | -73.880127 |
| 71 | Congo Gorilla Forest | Zoo | 40.847774 | -73.881604 |
| 98 | Madagascar | Zoo | 40.852627 | -73.879281 |

- After exploring the Neighborhood of Fordham using Foursquare API, we were able to get the results of all the nearby Zoos with it's location given in longitude and latitude.

Discussion

1. The map shows the location of each individual neighborhoods and I realized that they are more or less separated equally in terms of distance.
2. There are more neighborhoods nearer to the central of Bronx compared to those nearer to the seaside.
3. With the table showing top 100 venues closest to Fordham. One of the top venues that appeared the most is food & beverage. Mainly restaurants, cafes, pizza and bakery.
4. When zoo was searched, it appears that they do not have a bird park of its own.
5. Business developer, owner or entrepreneur can use this data to explore other business idea. Such as opening Nocturnal Zoo or bird parks, or even opening theme café as food & beverage seems to have quite a competition in Bronx.

Conclusion

This analysis was done with limited data and the results produced may not be very accurate but to a certain extend. With the table showing the nearest top 100 venues from Fordham, people living there or tourist visiting Fordham will know some information that can be useful for them.