



Vegi New York

Choosing a location for a new vegetarian restaurant in New York

Rise of Vegetarian Diets

- Growing trend of plant-based, vegetarian and vegan diets in USA.
- Good for environment and for health.
- New York City is one of the most vegetarian-friendly city in USA
- Good business opportunity to open more vegetarian restaurants in New York City

NYC Vegi Scene

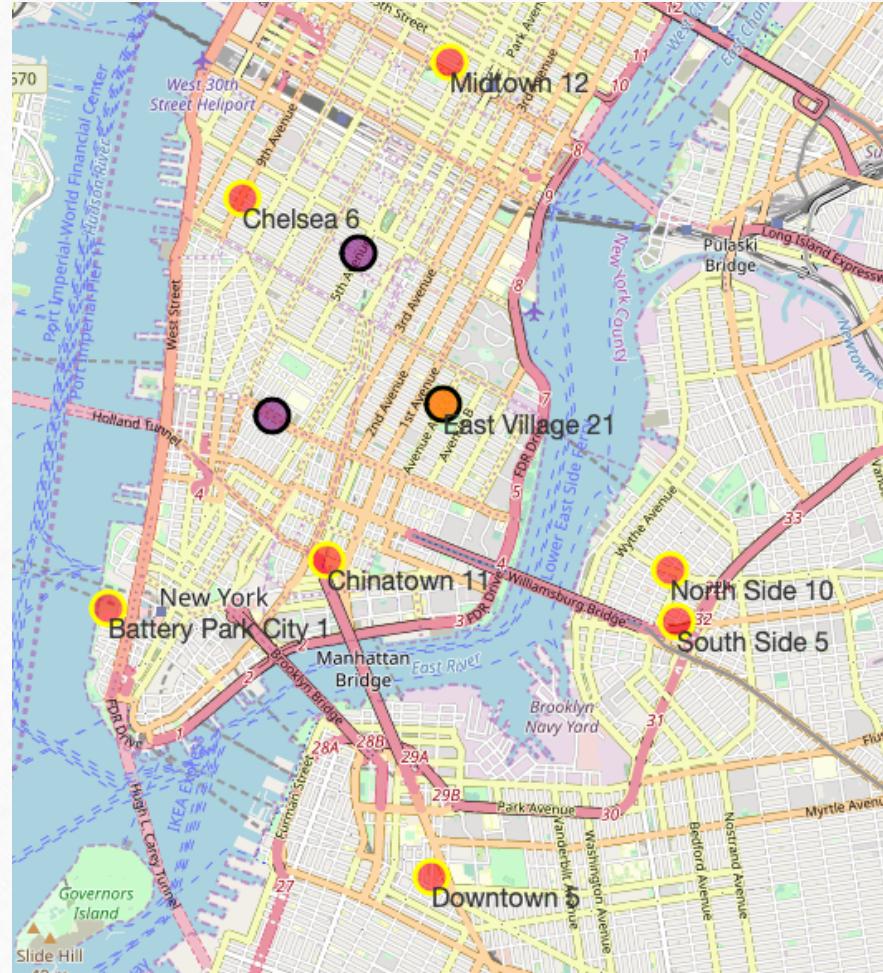
- Many neighborhoods in Manhattan and Brooklyn already have many successful vegetarian restaurants
- The neighborhoods with most popular vegetarian restaurants are
 - East Village
 - Flatiron
 - Greenwich Village
- Our goal is to find neighborhoods similar to the above three neighborhoods which have similar clientele

Finding Similar Neighborhoods

- Data Science technique is used to find similar neighborhoods
- Collect venue data in all neighborhood using FourSquare
- Use machine learning technique k-means clustering to cluster similar neighborhoods together based on popular venues.
- Use visualization technique to understand results

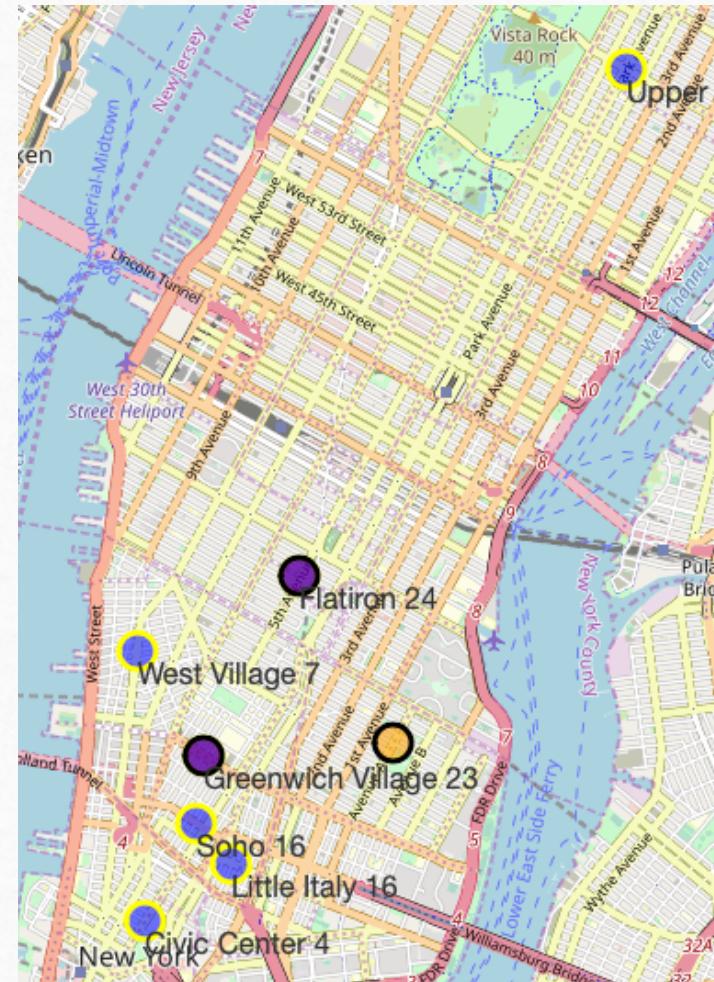
Neighborhoods in same Cluster as East Village

Midtown
Chelsea
Chinatown
Battery Park City
North Side (Brooklyn)
South Side (Brooklyn)
Downtown (Brooklyn)



Neighborhoods in same
cluster as Flatiron,
Greenwich Village

West Village
Soho
Little Italy
Civic Center
Upper East Side



Filtering on potential neighborhoods

- Eliminate neighborhoods (Battery Park City) that has too few vegetarian restaurants
- Eliminate neighborhoods (West Village, Chelsea) too close to established vegetarian neighborhood
- Eliminate neighborhood (Chinatown, Upper East Side) where median age is too different from the successful vegetarian-friendly neighborhood
- Ideal neighborhood should have medium number of vegetarian restaurants, but still have demand to accommodate more

Recommendation: Desirable Neighborhoods for new Restaurant

Similar to East Village

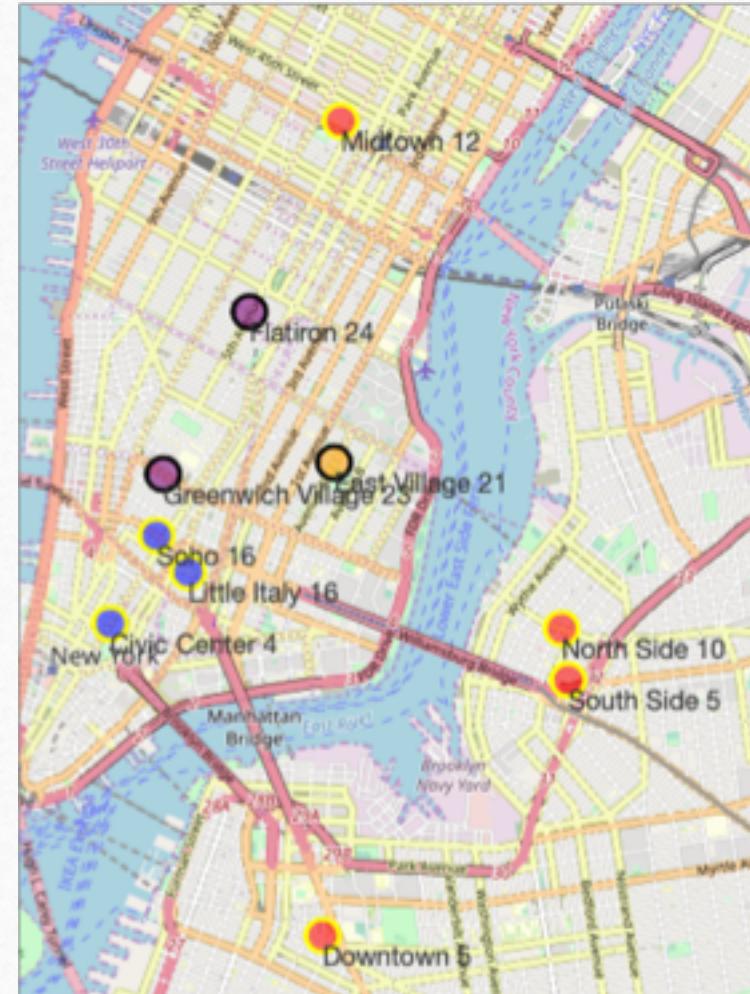


- Brooklyn: **North Side, South Side, Downtown**
- Manhattan: **Midtown**

Similar to Flatiron and Greenwich Village



- Manhattan: **Soho, Little Italy, Civic Center**

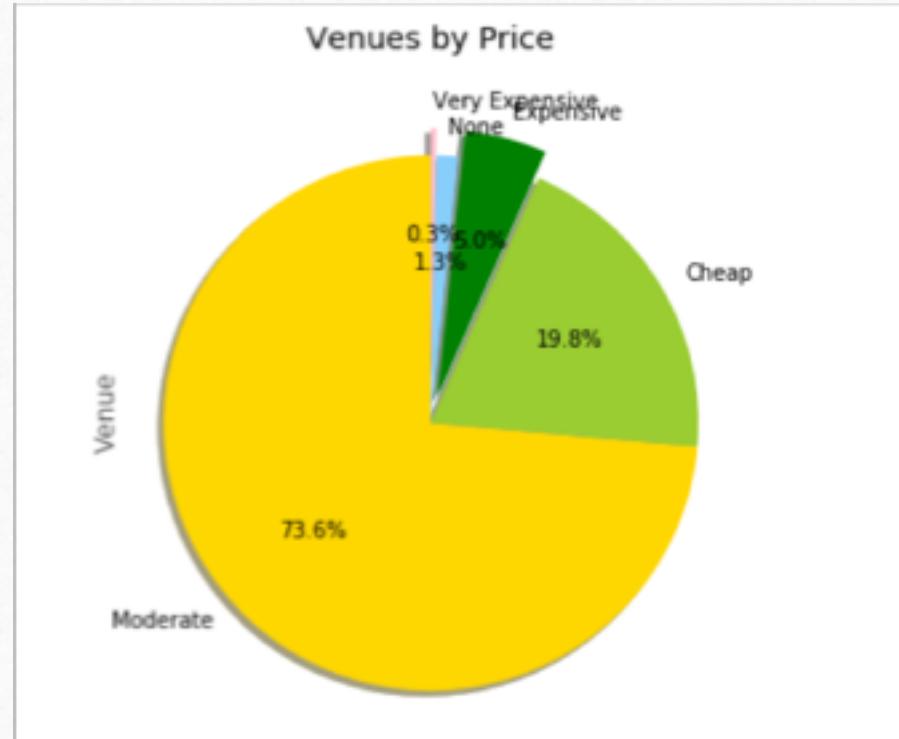


Recommendation: Price Range of new Restaurant

Recommendation for price range of the new restaurant is:

Moderate

since the majority of existing vegetarian venues are of moderate price range





Conclusion

-
- Provided recommendation on multiple neighborhoods suitable for new vegetarian restaurant
 - Provided recommendation for restaurant price range
 - Client can further use information like CLIENT_ID = 'Z0BTVVTSKJC5YQQR0IDJ2BURE4GU13PN51SZZ0BBMFQITGSF' # your Foursquare ID
 - CLIENT_SECRET = '3GM10B0K01PENXFL5UT3QIX43UMVSC3CUP0OZ21RHBKATH5M' neighborhood foot traffic, neighborhood rental price & availability to make final decision