

NYC's residential landscape pre-pandemic

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Project 1



NYC residential real estate: down, but not out

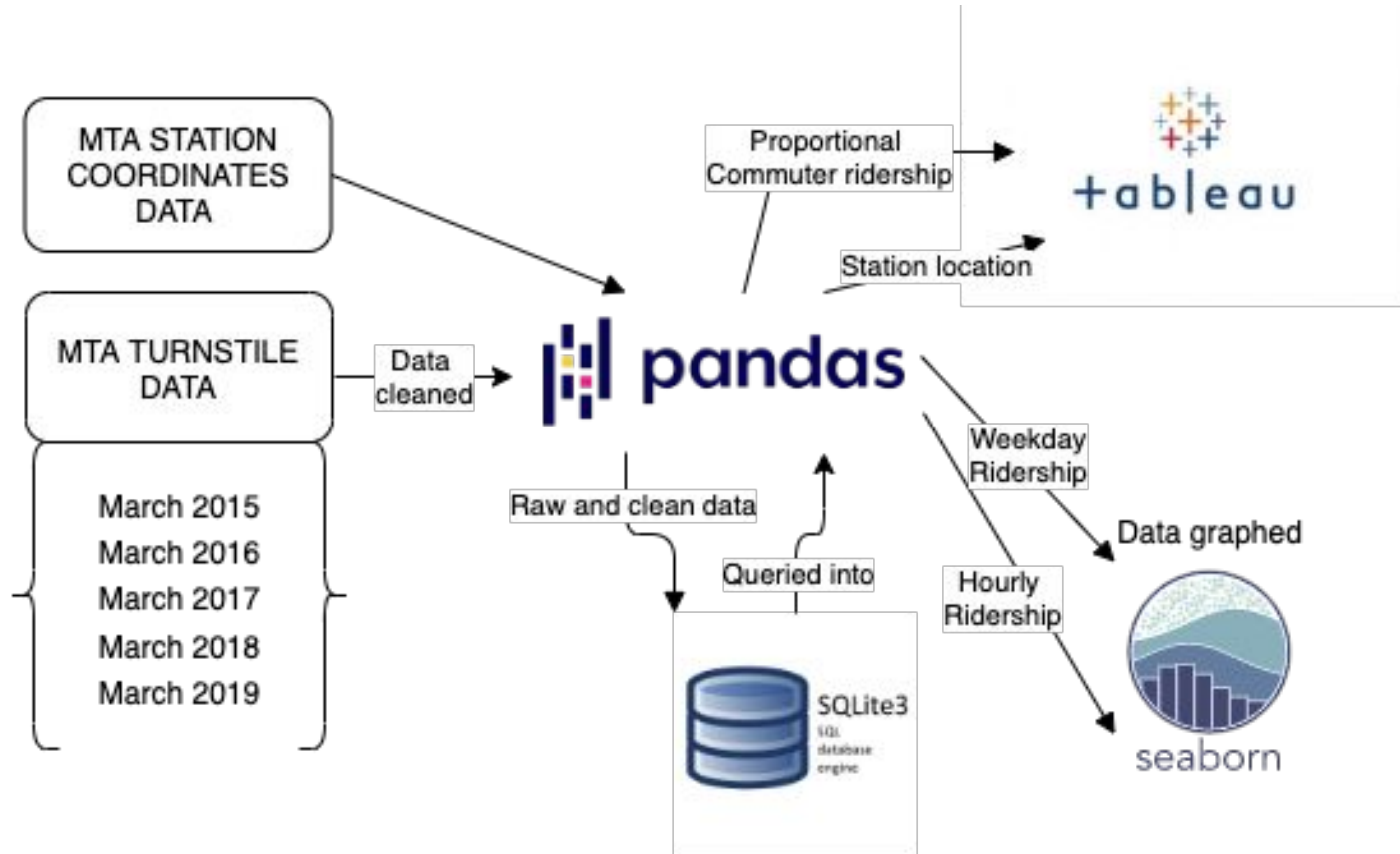
The Opportunity:

- Residential real estate prices are down 20% from early 2020
- People are moving back to NYC as the pandemic wanes
- Buy the dip now! Low prices, low mortgage rates

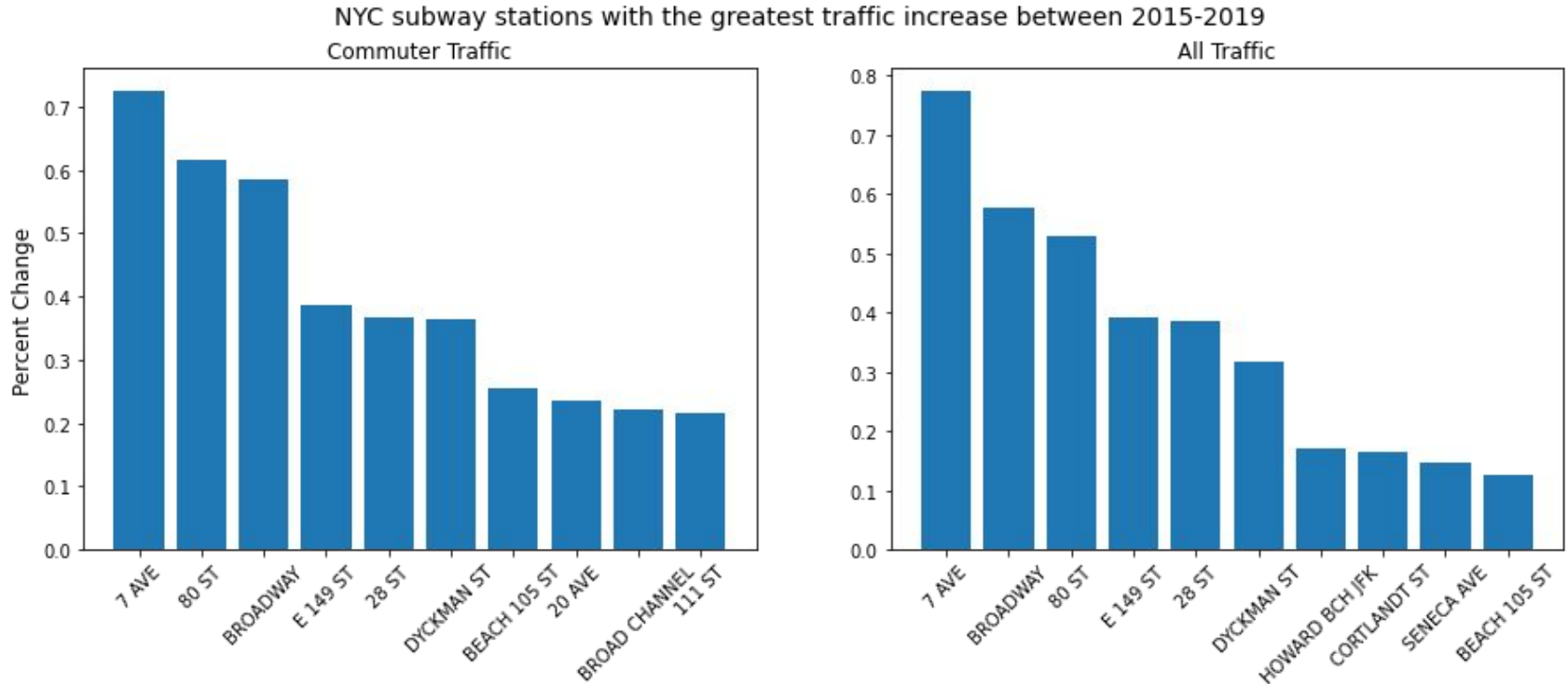
The Analysis:

- Obtain data available from the MTA on exits and entries from each turnstile in each station
- Identify subway stations with highest growth in commuter traffic, suggesting a burgeoning neighborhood
 - Commuter traffic is defined as turnstile entries between 6:00 - 10:00 on weekdays

Data and Workflow



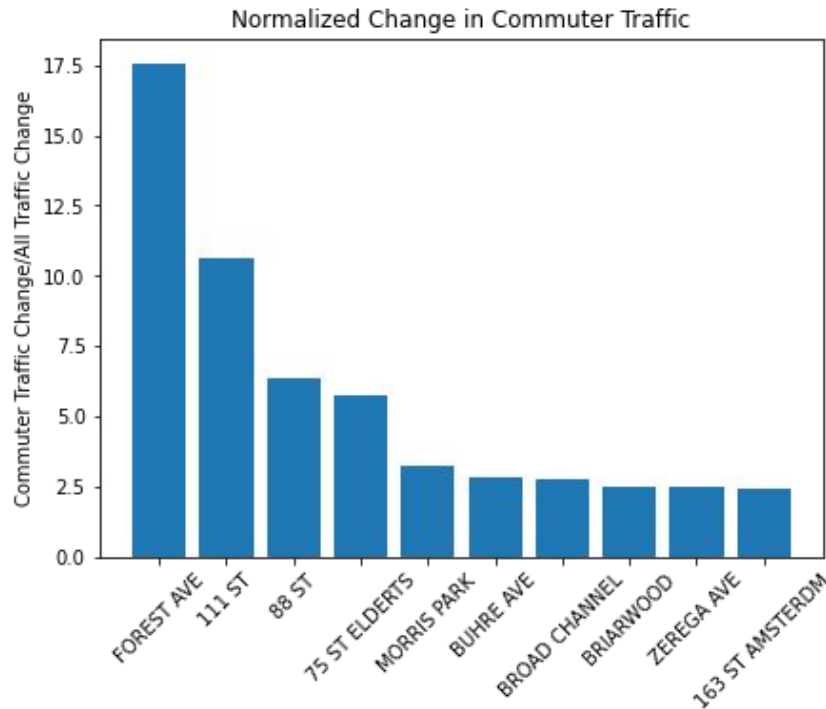
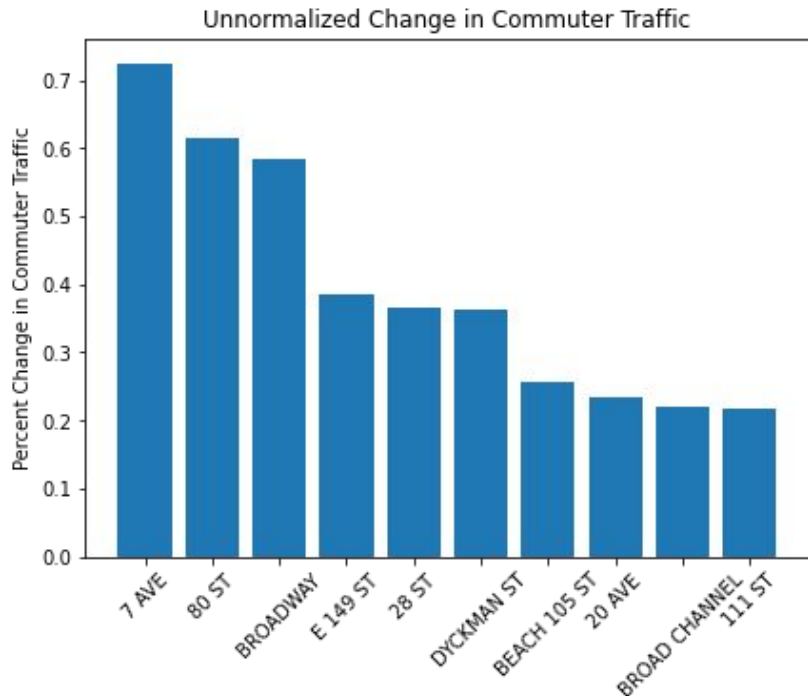
Changes in subway traffic between 2015-2019



The ten stations with the highest increase in traffic are mostly the same when comparing commuter traffic and all traffic.

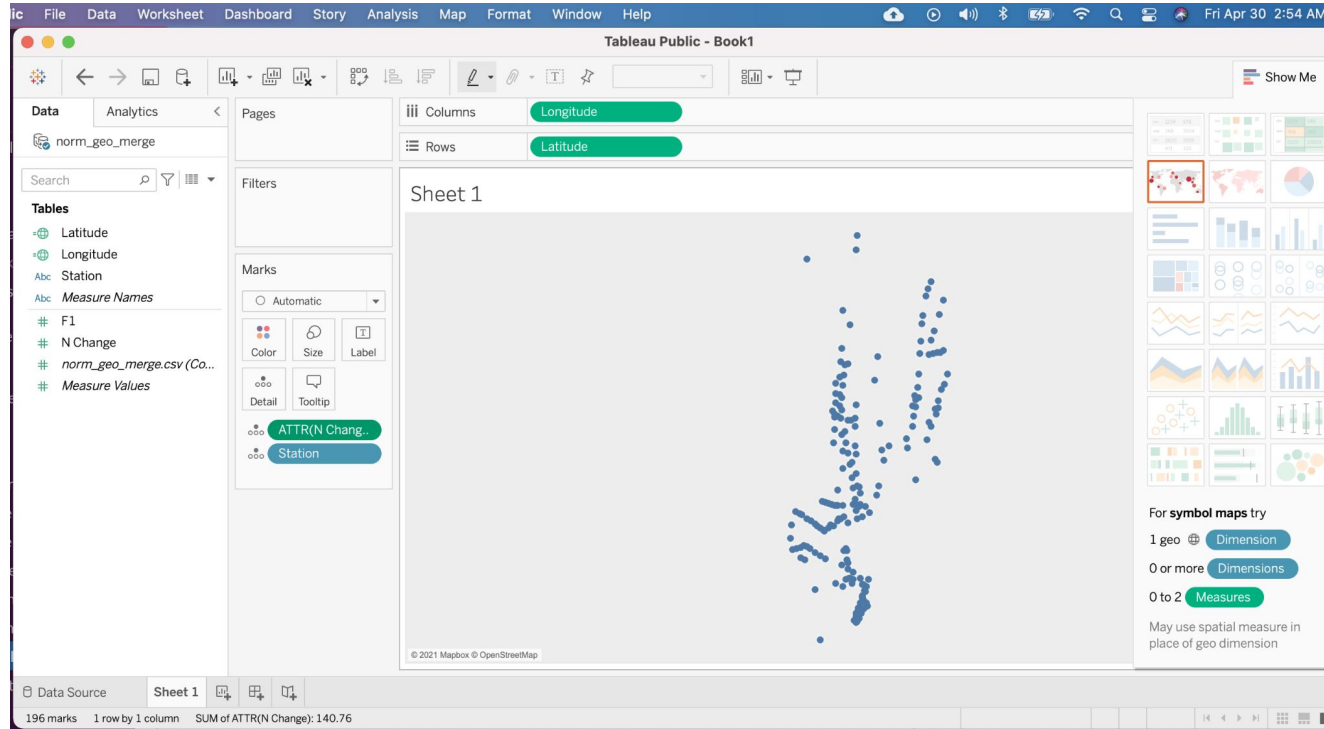
Changes in commuter traffic between 2015- 2019

NYC subway stations with the greatest change in commuter traffic between 2015-2019



The ten stations with the largest increase in commuter traffic mostly different when comparing unnormalized and normalized percent changes.

Stations with growth in commuter traffic

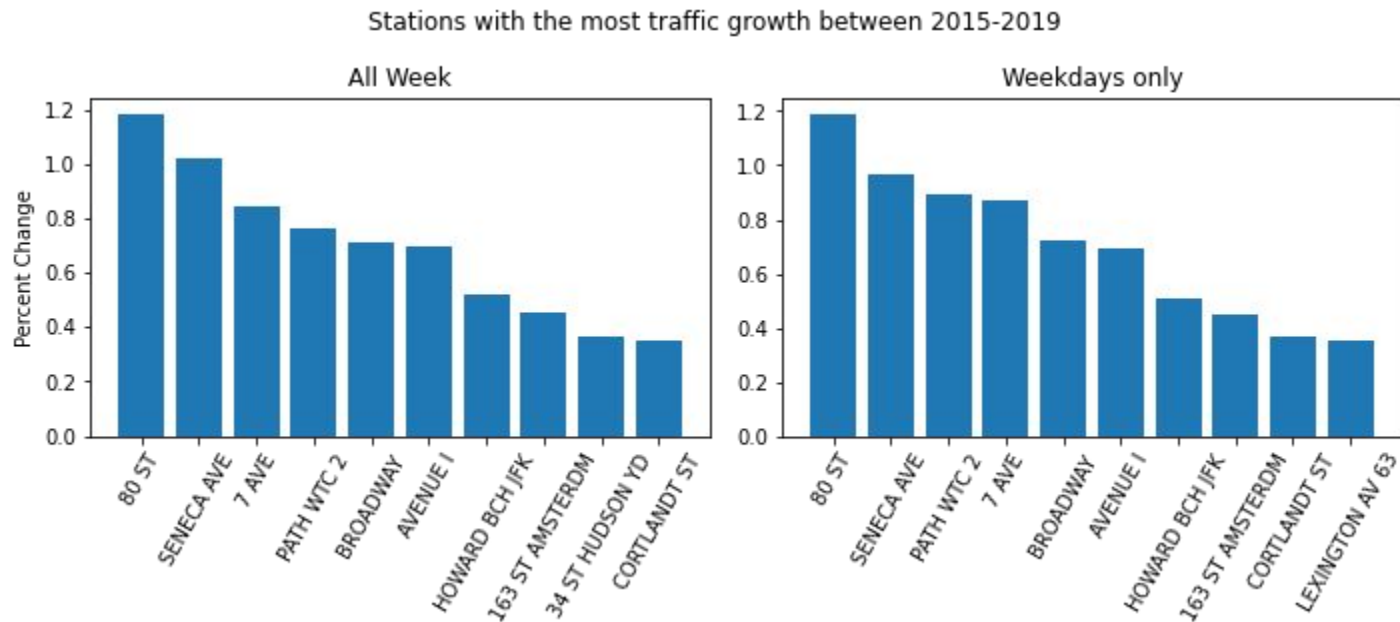


Most of the stations displaying proportional commuter growth greater than 50% are outside of Manhattan.

Future Directions

- Plot all data using Tableau
- Include all data available from February 2015 - February 2020 by incorporating cloud computing
 - Exclude holidays, major weather events, etc...
- Validate the assumption that a growing commuter population correlates to more profitable real estate investments
- Identify residential properties types that showed the greatest relative increase in pricing pre-pandemic
- Ensure that areas around the station identified in this analysis has not witnessed increased crime during pandemic relative to the entire city
- Weight growth from year-to-year based on overall population influx

Stations with the greatest increase in traffic pre-pandemic



The top fastest growing stations are mostly the same when comparing all days of the week to weekdays only ₈