

# Yellow-Taxi Analysis in NYC

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**Background - Why we choose this topic**



## Background - Why interesting? How Useful? Why important?

Our visuals address all of these questions and many more.

Interesting

Useful

Important

*How bad is the rush hour traffic from Midtown to JFK Airport?*

*Where does the Bridge and Tunnel crowd hang out on Saturday nights?*

*What time do investment bankers get to work?*

*How has Uber changed the landscape for taxis?*

*Could Bruce Willis and Samuel L. Jackson have made it from 72<sup>nd</sup> and Broadway to Wall Street in less than 30 minutes?*





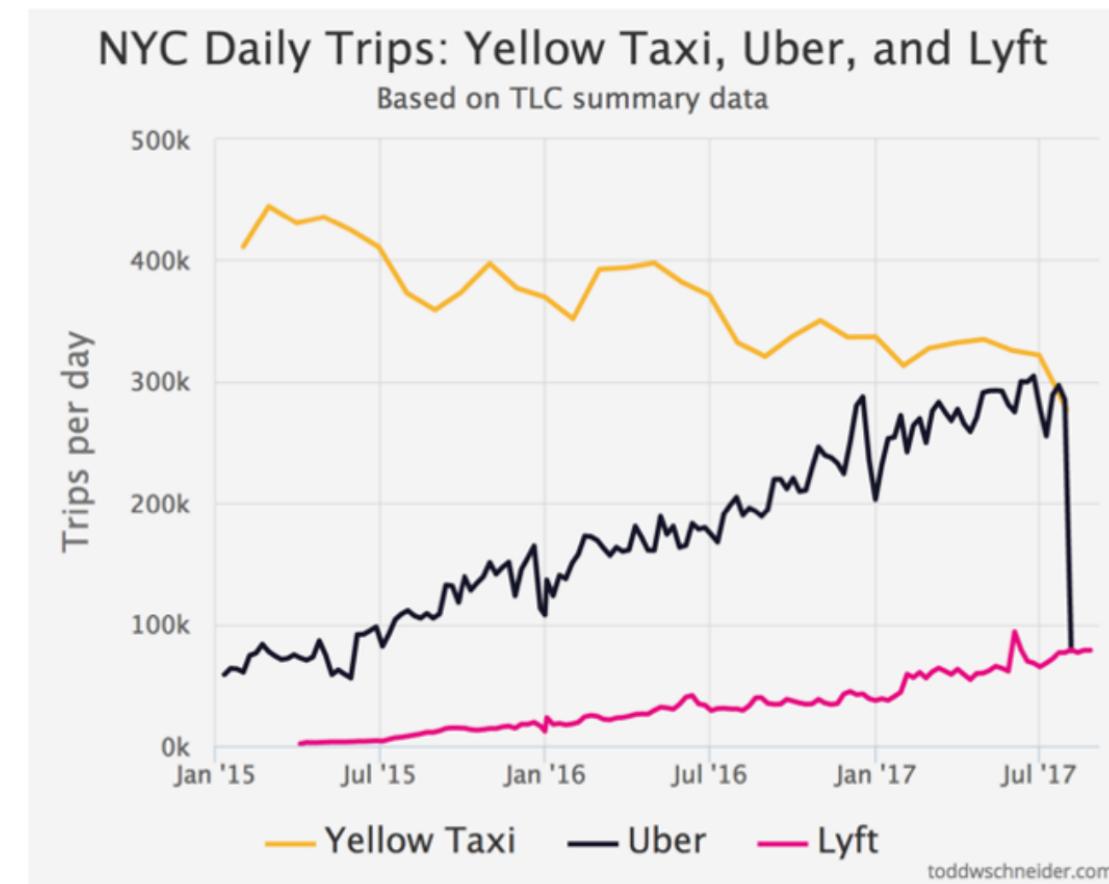
## Background - Why we choose this topic

### Volume

1.1 billion individual taxi trip  
from Jan. 2009 to Jun. 2015

### Veracity

LA(single) vs. NYC(multiple)



## Solution – Who is the audience?



## Solution – Who is the audience?

Ride-sharing service

UBER



lyft

Breeze™  
BIKE SHARE  
Presented by hulu

Individuals  
(especially for tourists)



## Technical Details – How to design, build and evaluate?



## Solution – Story Telling

What if ofo wants to enter into NYC after landed in Seattle?

How can Uber and Lyft extend market share?



## Solution – What are the deliverables?



## Solution – What are the deliverables?

Paper



Describe the  
project

Interactive  
Infographic



Scatter plot  
Pie chart  
Line chart  
Chord graph  
Slope graph

Video



Show  
how to use  
the infographic



Technical Details – What are the technologies you plan to use?



## Technical Details – How to design, build and evaluate?

Extract Information

Choose Vis Techniques

Dimension Wheel





## Technical Details – What are the design considerations?

Data Preprocessing

Show large amount of Information





## Technical Details – What are the technologies you plan to use?

### Tool libs



d3-brush  
d3-geoPath  
...  
...

### Visualization techniques



Scatter plot  
Choropleth map  
Slope graph



## Technical Details – How to use interactive visuals?

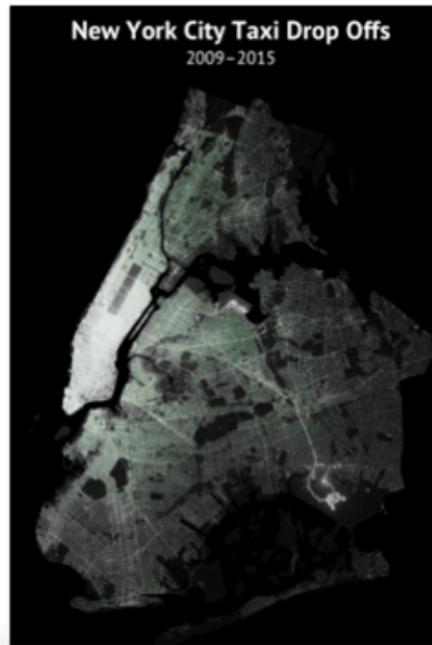
Hover on each zone

Scroll ——> Zoom in/out the map

Drag on zone ——> Choose start and end zone

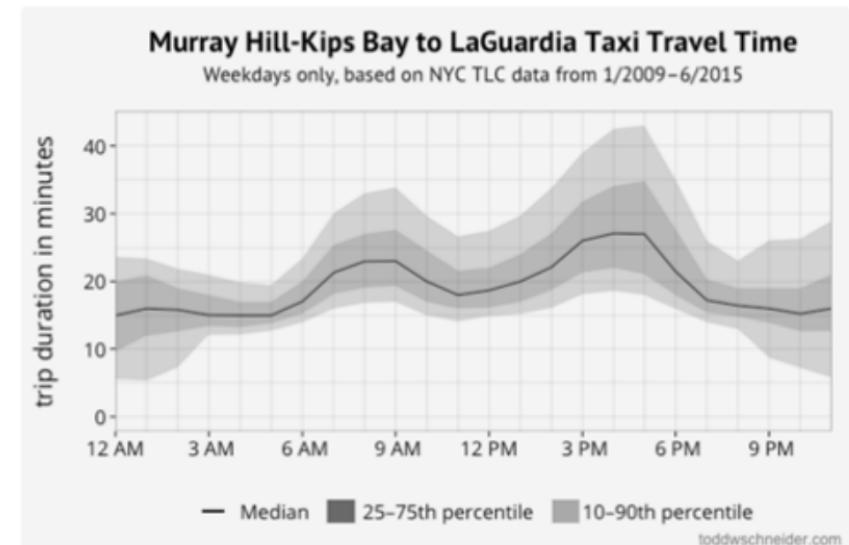


## Technical Details – Comparison?



Travel time from Murray Hill-Kips Bay, Manhattan to...

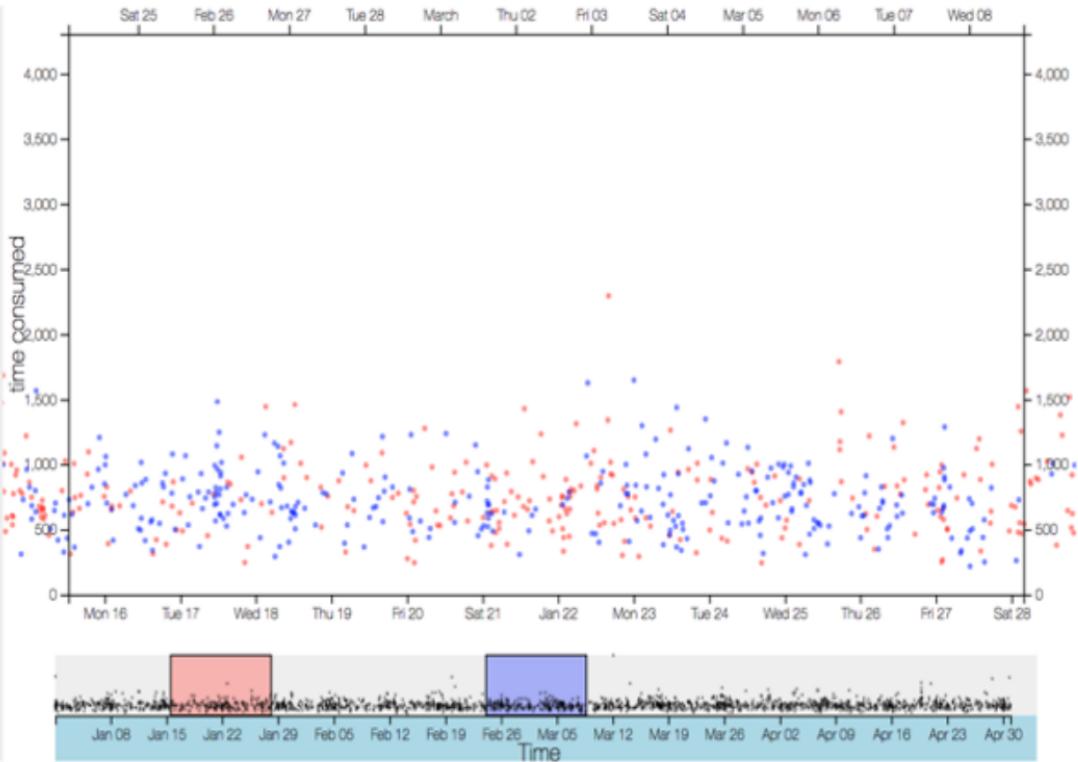
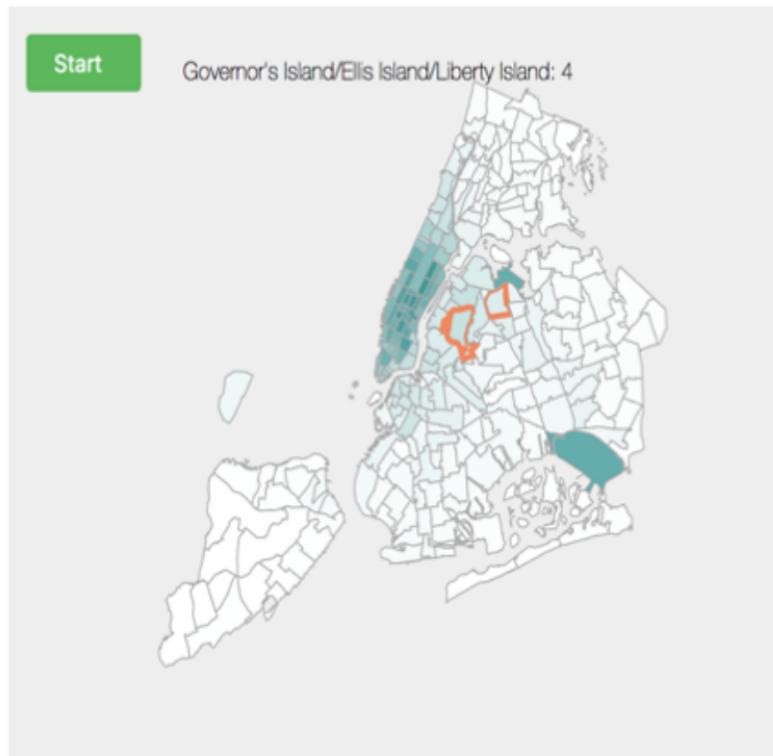
LaGuardia Airport





## Technical Details – What's cool?

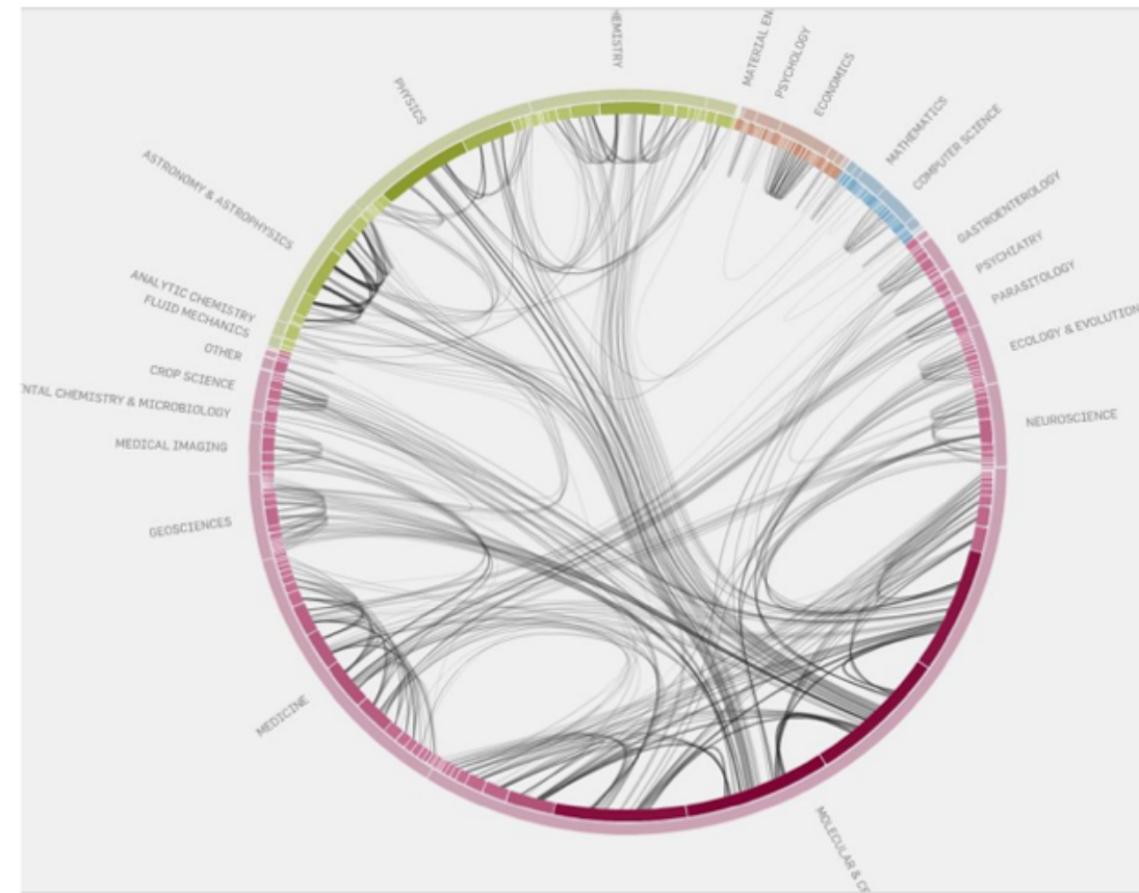
multiple(two here) brushes to enable direct comparison



## Teamwork – Timeline?



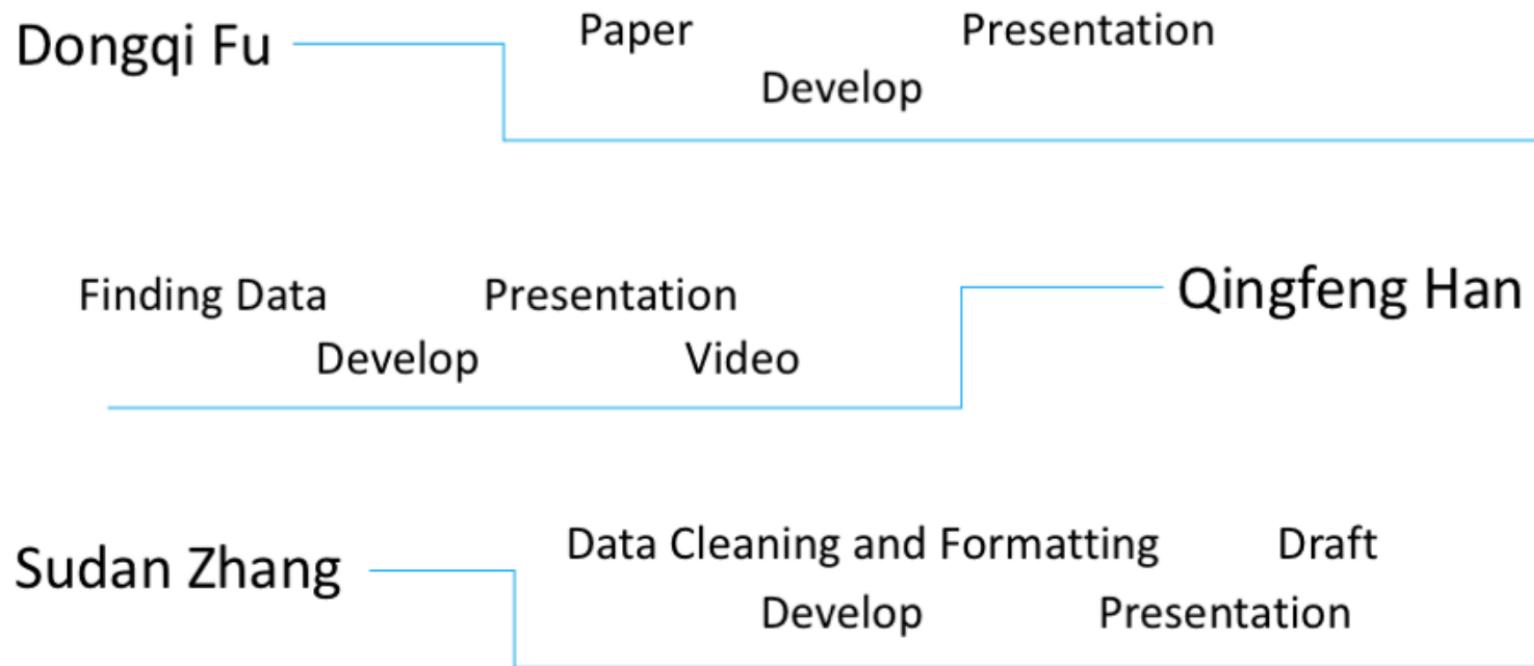
## Technical Details – What's cool?

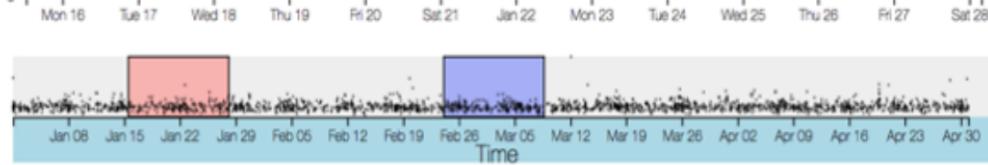


## Teamwork – How to work together?



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## Teamwork – Timeline?

