# Wildfires: Case Study

---- Group 4 (New York)

#### **Outline**

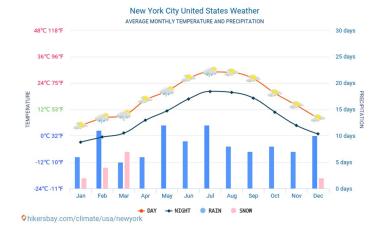
- Introduction to the problem
- Graphs
- Maps
- Challenges
- Conclusions
- Bonus



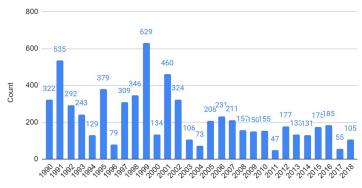
BY NICK REISMAN CITY OF ALBANY PUBLISHED 4:42 PM ET SEP. 25, 2020

#### Introduction to the problem

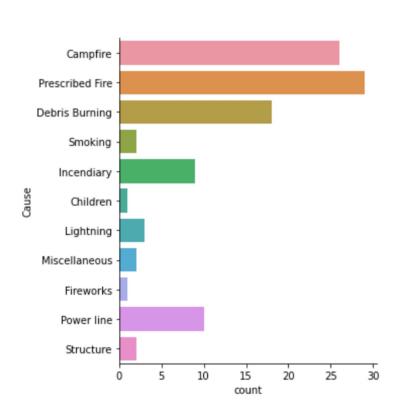
- New York is a state in the Mid-Atlantic and Northeastern regions in the United States.
- Humid subtropical climate
- An average of more than 200
   wildfires per year in the past 30
   years

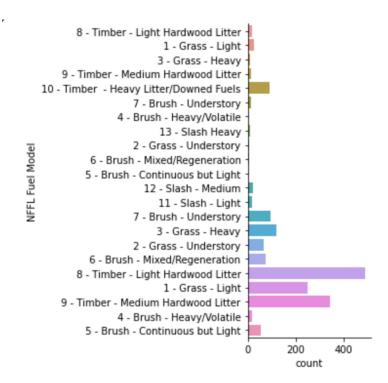




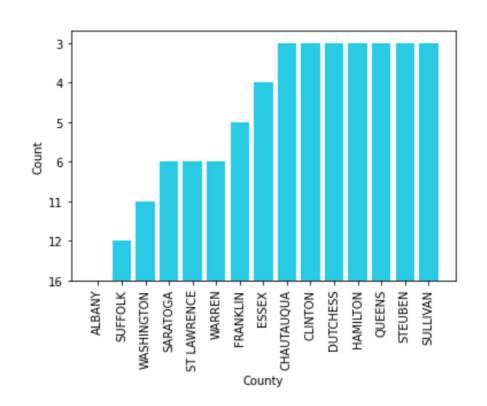


#### **Graphs**





# **Graphs**





# Maps

Thurman Fire

• Date: August 5, 2019

Non-Personal Expenses: 500

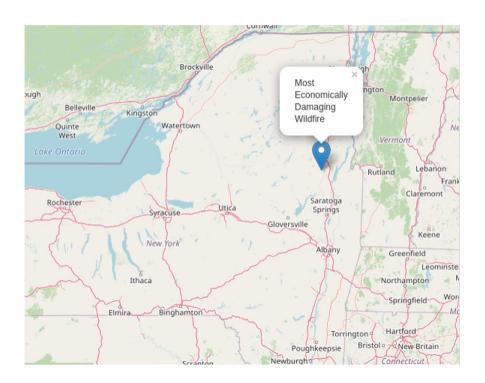
Fuel: Miscellaneous

Type: Slash Heavy

County: Waren

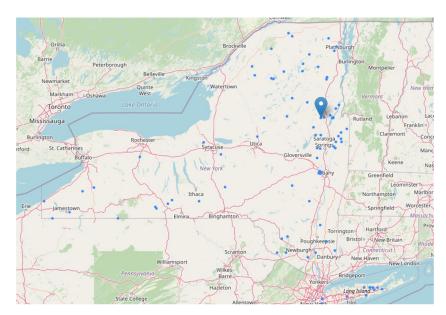
Municipality: Thurman

Location: Private Property

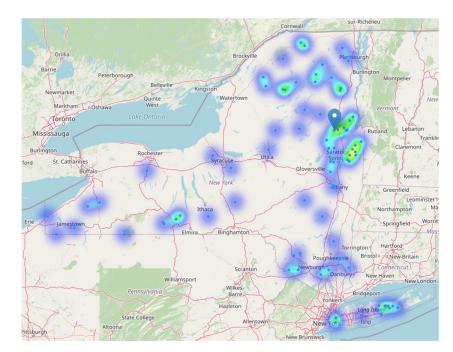


Most Economically Damaging Wildfire in New York (2019)

# Maps



Locations of Wildfires in New York (2019)



**Heat Map of Wildfires in New York (2019)** 

### Challenges

As a group we did not face many challenges or issues while coding. I think that the biggest problem was coordinating what each person's role was in either the data cleaning or the slideshow.

My issue

```
for index, row in newyork_df.iterrows():
    newyork_df['year'][index] - row['Fire Start Date'][:4]
    if newyork_df['year'][index] !- '2019':
        newyork_df - newyork_df.drop([index], axis-0)
```

KeyError: 'year'

KeyError: 'Main Fuel'

```
cause = newyork_df['NFFL Fuel Model'].unique()
count = newyork_df['NFFL Fuel Model'].value_counts()
plt.pie(count, labels= cause, wedgeprops= {'edgecolor': 'black'}, autopct= '%.2f%%')

for index, row in newyork_df.iterrows():
    if 'Grass' in newyork_df['NFFL Fuel Model'][index]:
        newyork_df['Main Fuel'][index] = 'Grass'
    elif 'Timber' in newyork_df['NFFL Fuel Model'][index]:
        newyork_df['Main Fuel'][index] = 'Timber'
    elif 'Slash' in newyork_df['NFFL Fuel Model'][index]:
        newyork_df['Main Fuel'][index] = 'Slash'
    elif 'Brush' in newyork_df['NFFL Fuel Model'][index]:
        newyork_df['Main Fuel'][index] = 'Brush'
```

#### **Work Cited**

Our Colab link:

https://colab.research.google.com/drive/16mshO0EmyLFZDo5BoMVuqazuc25c6Haa?usp=s haring

"Wildfires." Wildfires, www.dec.ny.gov/lands/4975.html. Accessed 25 Aug. 2021.

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"What Is the Weather like in New York City? New York City United States Weather. Climate and Weather in New York City 2021." Hikersbay, hikersbay.com/climate/usa/newyork?lang=en. Accessed 25 Aug. 2021.