Describe the core message or hypothesis for your project.

What impact did covid 19 have in these 5 market sectors?

The five market sectors we are analyzing are sp500, Finance, Tech, Real Estate, and Biotech. Which will be represented by the following ETF’s.

SP500 (SPY)

Finance (XLF)

Tech (XLK)

Vanguard Real Estate ETF (VNQ)

Biotech (IBB)

Describe the questions you and your group found interesting and what motivated you to answer them.

We are looking to target Private Equity Firms. As a PE, What market sectors would I look to invest in after analyzing this data?

Are there any specific correlations as to when the first covid case hit in the U.S. and the market volatility within these specific ETF’s ?

Which market sectors out performed the market and which underperformed?

How did these specific market sectors compare against the overall market during covid 19?

Which one of these market sectors was the best/worst performing during the start of covid 19?

What are some of the emerging trends in these market sectors pre and present covid?

Summarize where and how you found the data you used to answer these questions.

First we obtained the closing prices from google finance starting from 2017, which is being used as our historical data for our market sectors. We then calculated the beta, standard deviations, and sharpe ratios for each ETF. After we did this we compared it to the present covid (1-22-2020:11-3-2020).

Describe the data exploration and cleanup process (accompanied by your Jupyter Notebook).