**Pierre Carpentier- Springboard Capstone Project Proposal**

1. **What is the problem that I want to solve?**

With all the excitement of the US election past us, being able to predict future outcomes in reimbursement rates for private plans in the US healthcare system will become critical for companies’ in that market to adjust their positioning. First, an understanding of what the past 8 years of health care reform has changed in the revenue cycle structure of the market is critical. When the Affordable Care Act was implemented, it created a market of health coverage plans that was subsidized in part by the government, for which any individual can sign up for health coverage at a lower rate. The idea was to expand the grow the existing pool of patients in a free market type of environment in the hopes that the competition would help drive value, in terms of health benefit coverage, to millions of Americans that currently could not afford it. While the Affordable Care Act directly addressed access issues, it did little to address cost issues in terms of pricing for health care services. My thesis is that given pricing for services was not addressed in the Affordable Care Act, and that many common services are priced significantly higher than comparable services in other countries, and given that government subsidies are bridging the gap, the marketplace health plan rates do not differ significantly from private insurance rates pre-Affordable Care Act implementation. This would present a big problem to the newly elected federal government, and limit their options for reforming Health Care law.

1. **Who is your client and why do they care about this problem? In other words, what will your client DO or DECIDE based on your analysis that they wouldn’t have otherwise?**

Depending on the depth of the data available, my client could be State government officials trying to understand what effect Health Care reform would have on their funded Medicaid programs. They could decide to expand Medicaid coverage using Federal government subsidies and offer less options on the Affordable Care Act marketplace. Another user of this information could be Federal government policy makers trying to understand what the next logical move in Health care reform should be. This group could decide to allow government to negotiate prices for services, which would cause narrow networks and consolidate the industry, or, they could decide to no longer subsidize the marketplace plans, which would cause them to not be economically sustainable.

1. **What data are you going to use for this? How will you acquire this data?**

I will start by gathering Health Insurance Marketplace data from Kaggle that shows plans rates and benefits. I will likely choose to narrow my findings to a specific State, and focus the remaining questions on smaller subset of data. Depending on the initial findings, I may require some more data sets pertaining to service level pricing. Given that I currently work in the US healthcare space, I am confident that I will be able to find the correct data sets in the public domain through various government sites.

1. **In brief, outline your approach to solving this problem (knowing that this might change later).**

I will begin by analyzing and wrangling the original data set to present a snapshot of how plans rates and benefits vary across different States. This will likely lead to a variety of different conclusions from which I will select 1 State in particular to dive deeper and provide a few more insights on the variety of plans. This may involve grouping plans by a derived metric of ‘value’

1. **What are your deliverables? Typically, this would include code, along with a paper and/or a slide deck.**

I will save the .R script used to produce all the data in a Git Hub repository, as well as publish a paper, including interesting data visualizations explaining the outcomes of the findings. Lastly, a slide deck will be produced to showcase the data story aspect of the project.