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SODA 496
Assignment 1

I am studying the relationship between government spending on family and the female labor participation rate in each country. I will use country-year datasets to do to measure changes in government spending and labor rates over time in different nations. I hypothesize that as government spending on families increases, the female labor participation rate will increase in each country. Government spending in this sector allows women to take leave and exercise their rights in the workplace without the threat of losing their job. Women are more likely to advocate for big government; however, does big government benefit their physical and financial security?

I gathered my data from Our World in Data and the International Labor Organization. Both organizations are focused on data integrity; however, this data is collected from multiple sources and has attributes with varying types. The data from the International Labor Organization had twelve thousand rows before cleaning whereas the data on social spending by governments globally had around two hundred rows. My current datasets are small and after cleaning, my data only includes around two hundred rows; these datasets can help us predict the overall relationship, but it is not possible to predict the relationship between government spending and female labor rates in each country. As this panel data, the years do not always align for each country and not all countries report accurate or sufficient data. My hypothesis of the positive influence of government spending on female labor rates may not be true globally as research largely focuses on western countries. Subsequently, the conclusions from this data may not be applicable to non-western countries as cultural norms and confounding variables may have more influence.

I will use a regression model to determine the relationship between our independent and dependent variables, government spending on family and the female labor participation rate. The regression model will be multi-variate as other variables are included as control variables such education level and martial status. Regression is best to measure when the response variable, the y-variable, is continuous.

This research can help us utilize resources that may not be accessible to all groups. The government has more power and support to enforce laws; therefore, a policy that advocates for women's civil protections in the workplace can be enforced. Without the law, employers can be prejudiced and fire women whenever they feel with no consequences. As both are linked, jobs provide women with financial independence and security for their safety; protecting women's jobs is critical to protecting their safety and financial independence. I want to investigate, if any, the influence that institutions can have on social issues that prevent populations from suffering under traditional systems. Future work includes running the regression and fine-tuning parameters. Traditional systems are enveloped in discrimination, and ignoring the lack of inclusivity in our public institutions only prevents them from being used by all the public. All public institutions should advocate for the progress of all citizens and should not prevent citizens from any group to achieve financial and physical security.