## Assignment #4

## Complete the following tasks:

- Using the dataset of your choice, do the following
- Import the data using code
- Create a subset of your dataset with only the variables you want to use for this assignment
- Run a statistical test for means between two-groups.
  - Be sure to discuss the variables you are using (i.e. create a descriptive table with central tendency and variance indicators).
  - Be sure to discuss the test you are using and mention why you used this test.
    Discuss what these results mean. For instance, you could say, "The results of the t-test show there is a statistically significant difference in level of education between men and women. This aligns with former research (CITE)."
- Run a statistical test for means between more than two-groups.
  - Be sure to discuss the variables you are using (i.e. create a descriptive table with central tendency and variance indicators). This can be combined with the table from above, but you will still have to mention the variables you are using. For instance, "Table 1 above displays the means and standard deviations for income and the political party identification categories."
  - Once again, discuss the test you are using and mention why you use this test.
    Discuss the results of the test.
  - If a significant finding is determined, then where are the differences between the categories? (Hint: Post-hoc)
- This should be done in narrative format. Start writing these assignments like you would a paper with a healthy discussion of the variables, their central tendencies, their variation, any statistical test that you run on them and give the reader some idea of the importance of these results break it down for those uninitiated with your work.

## Assignment #4

## What to turn in

- Publish your homework to GitHub under your user account, the appropriate format (check syllabus for instructions). This means turn in a separate document from your code that answers the questions above.
- Upload the code you used to GitHub.
- Provide me the links of these two files via e-mail no later than Thursday, October 8<sup>th</sup> at 6:00pm.