

Assignment 3

Using the api dataset, (https://stats.idre.ucla.edu/stat/stata/seminars/svy__stata__intro/apipop) complete the following steps for each type of school: elementary, middle school, and high schools. Do this by creating a loop structure around the following steps.

1. Create a series of macros, one for each of the following characteristics of schools: parents, teachers and student.
2. Create a table of descriptive statistics for these variables using the `esttab` command. Make sure it is clearly labeled.
3. Generate a table of conditional means of `api00` as a function of other interesting independent variables.
4. Create a scatterplot or scatterplots that display some of the key relationships in the data. Clearly label this scatterplot.
5. Run a series of regressions, one for each “set” of characteristics and one fully specified model, with `api00` as the dependent variable.
6. Report the results of your regression in a beautifully formatted table.
7. Create a graphic that shows the impact of the various independent variables on the outcome variable. Clearly label and describe this graphic.

Submit a do file that will accomplish all of these steps. Submit a word file that includes all of your graphics and tables.