This directory contains data and code that replicates the tables and figures for the following paper:

Title: My Paper

Author: Julian Reif

Directory Structure

The original, raw data are stored in CSV format in the folder: data/raw

All results (LaTeX tables and PDF figures) are outputted into the folder: results

All code is stored in the folder: scripts

Data Availability Statement

The automobile data used to support the findings of this study have been deposited in a Github¹ repository (https://github.com/reifjulian/my-project/tree/master/MyProject/analysis).

Datafile: data/raw/auto.raw

Dataset List

Data file	Source	Notes	Provided
data/raw/auto.csv	Stata		Yes
data/proc/auto.dta	Stata	Cleaned version of auto.csv, serves as input for the main analysis	Yes

Software Requirements

Stata version 15 or higher

Add-on packages are included in scripts/libraries/stata and do not need to be installed by user

R version 3.6.0 or higher (available for free from: https://cloud.r-project.org)

- Two add-on packages are required: tidyverse, estimatr
- These packages can be installed two different ways:
 - o Manually by typing, e.g., install.packages("tidyverse") at the R prompt
 - o Automatically by running the script _install_R_packages.R
- Note: scripts/programs/ confirm version.R checks that these add-ons have been installed and are up to date
- Note: if you don't wish to install R, the R portion of the analysis can be disabled (see **Instructions** below)

¹ Github is not a proper data archive. For AEA publications, you can deposit your materials at the AEA Data and Code Archive.

Description of Scripts

0 run all.do is a master script that sets up the environment, creates output folders, and then calls other scripts.

- 1 process raw data.do imports the raw automobile data and saves it in Stat format.
- **2_clean_data.do** processes the automobile data and prepares it for analysis.
- **3_regressions.do** estimates regression models in Stata, and calls an R script that estimates additional regression models in R. The raw regression results are saved in **results/intermediate**.
- 4 make tables figures.do creates figures and tables, saving them to results/figures and results/tables.

Memory and Runtime Requirements

This analysis requires minimal memory and processing resources. The analysis was last run on a Windows 10 Desktop with 32 gigabytes of RAM and an i7-8700 CPU 3.20 GHz processor. The runtime was less than one minute.

Instructions

Executing the Stata script **scripts/0_run_all.do** will run the analysis and generate all tables and figures. Before running this script, you must make two edits to lines 21 and 22 **0_run_all.do**:

1.	Line 21: Define a global macro, MyProject, that points to the directory containing this README file				
2.	Line 22: Define a global macro, RSCRIPT_PATH, that points to your R executable				
	global MyProject "C:/Users/jdoe/MyProject/analysis"				
	global RSCRIPT_PATH "C:/Program Files/R/R-3.6.2/bin/x64/Rscript.exe"				

The R portion of the analysis requires the add-on packages listed in the **Software Requirements** section above. These can be installed automatically by running the R script <u>install_R_packages.R</u>.

If R is not available on your system, you can disable the R portion of the analysis by setting the global macro **DisableR** equal to 1 in line 25 of **0_run_all.do**:

global DisableR = 1	

Lists of Tables and Figures

Figure/Table #	Source script	Line Number	Output File	Notes
Figure 1	4_make_tables_figures.do	19	price_histogram.pdf	
Table 1	4_make_tables_figures.do	62	my_summary_stats.tex	
Table 2	4_make_tables_figures.do	103	my_regressions.tex	
Table 3	4_make_tables_figures.do	161	my_regressions_with_r.tex	

<u>Help</u>

Contact email: <u>jreif@illinois.edu</u>

Web guide: https://reifjulian.github.io/guide/