Readme Replication
The Slope of the Phillips Curve: Evidence from U.S. States

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1 State-Sectional Regressions - Main Results

The main code *regressions_cs.do*, creates all the tables in the paper that use the cross-sectional identification using our data. It uses the dataset *data_reg.dta*, and a .ado file that performs the two-sample two-stage least squares as in Chodorow-Reich and Wieland (2019). We only include this latter code for completeness, but refer to the website of the authors for the latest version. The code requires the functions ivreghdfe, and reghdfe. For information on these developments see http://scorreia.com/software/reghdfe/install.html.

The code is sufficiently commented as to explain the main steps to make it work, but here is a summary of the most important points to take into account.

- Step 0 asks the user to choose a local for the name of the path in which the folder will be saved. This should be a parent folder, in which there is a subfolder called *ReplicationPackage/code_to_share* in which the contents of the folder should be placed.
- Step 1 computes the present discounted value for unemployment and relative prices. It performs the discounted sum for a benchmark discount factor $\beta = 0.99$, and a truncation length of $T = 20$ quarters, as well as for $\beta \in [0.90.95]$ and $T \in [10, 30, 40]$.
- Step 2 is the main section of the code that reproduces all the numbers behind Table 1, Table 2, Table C.1, Table C.2, Table C.3, and Table C.4.
  - After each subsection, the code produces a .tex file with the name of the parameter estimated, the point estimate, and standard errors. These .tex files will not compile independently, they are meant to be used as inputs in the construction of a larger table according to the needs of the user.

  - Table 1, consists of *kappa_full_sample.tex* and *psi_full_sample.tex*
  - Table 2 is made using *kappa_time_varying.tex* and *psi_time_varying.tex*
  - Table C.1 consists of *first_stage_rp_sum.tex* and *first_stage_u_sum.tex*
  - Table C.2 consists of *lambda_full_sample.tex*
  - Table C.3 consists of *beta_vary.tex*
  - Table C.4 consists of *kappa_truncation.tex*
  - Table A.1 consists of *PV_dynamics.tex*

- The dataset includes the following variables
  - year
  - quarter
  - date: This variable is in format yq.
  - mean_une: mean unemployment rate
  - qt_bartik_sa: seasonally adjusted tradeable demand spillover instrument
  - state: name of the state
  - statecode: encoded variable for *state*
  - constant: a variable filled with ones used for the specifications without fixed effects
  - infl_reg: non-tradeable inflation
  - rp: relative price of non-tradeables

In order to keep the main code short, we include an additional .do file *binscatter_time_effects.do* that produces Figure 5. That do file uses the same database *data_reg.dta*, and produces binscatters with and without time fixed effects.

2 State-Level Results - Rent Data

The main do file to reproduce the rent data results is *rent_data_acs.do*. In order for this code to run properly, you must have run *regressions_cs.do* first, since it will create an intermediary dataset called *data_for_rents_reg.dta*. This dataset contains some of the intermediate variables created in the main cross-sectional analysis.

The code produces to *.tex* files, called *kappa_rent.tex* and *psi_rent.tex*, which replicate Table C.5. in the appendix. The ACS data comes from IPUMS USA. It contains information on rents, states, and observable characteristic of shelter units which we use to run hedonic regressions and compute state-level rent indexes.

3 Aggregate Results

The code *agg_data_figures.do* replicates Figure 6, C.2, and C.3. The code *romerize_inflation.do* replicates Figure B.1. The code *figures_1_3.do* reproduces the descriptive figures 1, 2, and 3.

In order to create Figure B.1. we data from FRED, and use 1977 CPI weights for different categories of consumer expenditures that we obtained from Appendix B of the 1984 Handbook of Methods of the BLS in its chapter on the Consumer Price Index. The code explains the weights that we use.