



Policy Uncertainty and Aggregate Fluctuations: Evidence from Emerging and Developed Economies

PRWP Reproducibility Verification Report

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This report verifies the reproducibility of the exhibits included in the paper “*Policy Uncertainty and Aggregate Fluctuations Evidence from Emerging and Developed Economies*”.

Contents in this review:

1. Main findings
2. Reproducibility assessment
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Main findings

- The code was executed on a clean setup after installing Matlab’s Optimization, Econometrics, and Statistics and Machine Learning toolboxes.
- The code has an approximate run time of 140 hours.
- We achieved a partial verification of the paper using this reproducibility package. All the exhibits generated by the package are reproducible, but several figures are not produced by the code and the package does not include instructions on how to reproduce them. For further details, please refer to sections Reproducibility assessment and List of exhibits and reproducibility status.
- We were unable to assess the package’s stability due to the time required for each run of the code.

Reproducibility assessment

Paper exhibits were attempted to be reproduced in a computer with the following specifications:

- OS: Windows 10 Enterprise, version 21H2
- Processor: Intel(R) Xeon(R) Gold 6226R CPU @ 2.90GHz
- Memory available: 32 GB
- Software version: Matlab R2023a, Dynare 5.4

We utilized the paper “*Policy Uncertainty and Aggregate Fluctuations: Evidence from Emerging and Developed Economies*” in its PDF format from its online version here. We then compared the code results with the exhibits in the paper to ascertain their reproducibility.

- All the exhibits produced by the code were successfully reproduced using the supplied package. However, several exhibits were not produced by the code. Specific instructions for how to reproduce these exhibits are not included in the reproducibility package. If needed, Replicators can contact the authors for assistance at fruch@worldbank.org or h.mumtaz@qmul.ac.uk

List of exhibits and reproducibility status

Results in the Main Section of the Paper

- **Table 1** Does not apply: the exhibit does not show analysis results
- **Figure 1** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 2** **Couldn't be fully verified** Taking the file Unc.xls sheet g, and taking the median you can see exactly the same trend as Figure 2.A blue line. Taking the median of sheet r you can see the median in Figure 2.B. However, there is not enough information in the instructions to replicate the complete figure.
- **Figure 3** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 4** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 5** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 6** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 7** **Couldn't be verified.** The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure 8A** **Reproduced, but figure is not produced by the code** Figure can be reproduced using file CF.xls sheet no_pol_all.
- **Figure 8B** **Reproduced, but figure is not produced by the code** Figure can be reproduced using file CF.xls generated from tab no_pol_poor for EMDEs in blue, and from tab no_pol_rich for Advanced economies in red. .
- **Figure 8C** **Reproduced, but figure is not produced by the code** Figure can be reproduced using file CF.xls sheet no_g_poor as stated in the README file.
- **Figure 8D** **Reproduced, but figure is not produced by the code** Figure can be reproduced using file CF.xls sheet no_mp_poor.

Results in the Annex

- **Figure A2.1** Couldn't be verified. The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure A3.1** Couldn't be verified. The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Table A3.1** Does not apply: the exhibit does not show analysis results
- **Figure A4.1** Reproduced
- **Figure A4.2** Reproduced
- **Figure A5.1** Couldn't be verified. The code does not generate the figure, and the README lacks instructions on how to reproduce it.
- **Figure A5.2** Couldn't be verified. The code does not generate the figure, and the README lacks instructions on how to reproduce it.