Reproducible Research Repository

Reproducibility Report: International Trade Policy And Quantitative Models: A Practitioner's Guide

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This review verifies the reproducibility of the exhibits included in the paper *"International Trade Policy And Quantitative Models: A Practitioner's Guide"*.

Contents:

Main findings

- **Every exhibit in the main section of the paper has been reproduced accurately.**
- The code was successfully executed on a new computer after:
  1. Running the codes in the appropriate order:
     (a) julia –project=. data_extract1.jl
     (b) python data_extract2.py
     (c) matlab -batch "data_extract3"
     (d) matlab -batch "data_extract4"
     (e) julia –project=. AO_Extended.jl
     (f) python Exhibits.py
- The output demonstrates consistent stability across multiple runs. Executing the code 2 times consecutively yielded identical results.
- The code takes approximately 10 minutes to run.
- We conducted our reproducibility analysis based on the paper shared by the authors on March 20th.
- **Verification Process and Data Handling**:
  - The reproducibility package relies on 2 types of data: accessible data; restricted data (available only from the authors).
  - Reviewers had access to the same materials in the public reproducibility package. The reviewers verified that publicly available data matches the data in the reproducibility package.

  - *data_hash_report.csv* lists the SHA256 hashes of all files in the Data folder to support data integrity checks. Users who acquire accessible data can use this file to verify that the data has not been altered.

- **Reproducibility Summary**:
  - **Data**: Some data is restricted and has not been included in the reproducibility package. For more details, please refer to the README file.
  - **Code**: All code files are included in the reproducibility package but operate from intermediate data, not raw data.
  - **Outputs**: All outputs are generated by code included in the reproducibility package.
  - **Reproducibility verification**: Reviewers had access to the same materials in the public reproducibility package. The reviewers verified that publicly available data matches the data in the reproducibility package.
  - **Dependencies environment**: The reviewers created a new environment using the latest versions of dependencies available at the moment of the review.

List of exhibits and reproducibility status

Results in the Main Section of the Paper

- **Figure 1** Reproduced
- **Figure 2** Reproduced
- **Figure 3** Reproduced
- **Figure 4** Reproduced
- **Figure 5** Reproduced
- **Table 1** Reproduced
- **Table 2** Reproduced

Results in the Annex

- **Figure A1 - A12** Does not apply
- **Table A1 - A3** Does not apply

Reproduction Environment

Paper exhibits were reproduced on a computer with the following specifications:

- OS: Microsoft Windows 11 Enterprise
- Processor: INTEL(R) XEON(R) PLATINUM 8562Y+, 2800 Mhz, 16 Core(s), 16 Logical Processor(s)

- Memory available: 128 GB
- Software version: Python 3.9; Matlab 2024b; Julia 1.12.5