



Reproducible Research Repository

Public Workforce Global Report

First Submission: RR_WLD_2025_527

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This review verifies the reproducibility of the exhibits included in the paper “*Public Workforce Global Report*”.

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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. Changing global paths in each script.
- The output demonstrates consistent stability across multiple runs. Specifically, executing the code two 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 by email on December 16th .
- **Verification Process and Data Handling:**
 - The reproducibility package relies on 3 types of data: open, limited-access and forthcoming data.
 - Open data is included in the public reproducibility package.
 - Reviewers used limited-access and forthcoming data provided directly by the authors to conduct the reproducibility verification, and this is not included in the public 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 the forthcoming/accessible/limited-access/restricted data can use this file to verify that the data has not been altered.
- **Reproducibility Summary:**
 - **Data:** Some data is not yet publicly available but is expected to be made available through the World Bank Microdata Library in the future.

- **Code:** All code files (from cleaning to analysis) are included in the reproducibility package.
- **Outputs:** All outputs are generated by code included in the reproducibility package. Some outputs are not generated by code (created manually in Excel) but instructions for producing these outputs are included in the README file.
- **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 ES2** Results reproduced, but figure includes manual changes from code output.
- **Figure ES3** Results reproduced, but figure includes manual changes from code output.
- **Figure ES4** Reproduced.
- **Figure 2.1** Results reproduced, but figure includes manual changes from code output. Some countries were not included in the manuscript exhibit.
- **Figure 2.2** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.3a** Reproduced. Verified against *Figure_2.3.png*.
- **Figure 2.3b** Reproduced.
- **Figure 2.4** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.5** Reproduced.
- **Figure 2.6** Reproduced.
- **Figure 2.7** Results reproduced, but table or figure includes manual changes from code output.
- **Figure 2.8** Reproduced.
- **Figure 2.9** Reproduced. Verified against online dashboard.
- **Figure 2.10** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.11** Results reproduced, but figure includes manual changes from code output. The figure is identical to figure ES3.
- **Figure 2.12a** Results reproduced, but figure includes manual changes from code output. Verified against *fig2_12bemp_preference_bosnia.png*.
- **Figure 2.12b** Results reproduced, but figure includes manual changes from code output. Verified against *fig2_12bemp_preference_bosnia*.
- **Figure 2.13** Reproduced.
- **Figure 2.14** Reproduced.

- **Figure 2.15** Reproduced.
- **Figure 2.16** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.17** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.18a** Results reproduced, but figure includes manual changes from code output.
- **Figure 2.18b** Results reproduced, but figure includes manual changes from code output.
- **Figure 3.1a** Results reproduced, but figure includes manual changes from code output. Verified against online dashboard and code output, Uruguay's value is not updated on the excel file authors submitted.
- **Figure 3.1b** Results reproduced, but figure includes manual changes from code output. Romania's value was extracted from World Bank Romania report.
- **Figure 3.2** Reproduced.
- **Figure 3.3** Reproduced.
- **Figure 3.4** Results reproduced, but figure includes manual changes from code output. Brazil's value was extracted from World Bank Brazil report.
- **Figure 3.5** Reproduced. Files were not exported as 3.5, file names are *fig3_2pressure_training_entity.png* and *fig3_2witness_training_entity.png*.
- **Figure 3.6** Reproduced. Verified against Stata output *fig3_8trainingreceived_countries.png*.
- **Figure 4.1** Does not apply.
- **Figure 4.2** Results reproduced, but figure includes manual changes from code output.
- **Figure 4.3** Reproduced.
- **Figure 4.4** Results reproduced, but figure includes manual changes from code output. Verified against *fig4_4A_receivedtopics.png* and *fig4_4B_demandtopics.png*.

Reproduction Environment

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

- OS: Windows 11 Enterprise
- Processor: Intel(R) Core(TM) Ultra 7 165U @ 2.60GHz
- Memory available: 31 GB
- Software version: Stata 19.0 MP and R 4.5.2