

OG-ZAF: An example of a full-economy model for South Africa

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Overview

- OG-ZAF Inputs
 - Parameters and larger objects
 - Where to find them
- OG-ZAF Output
 - Where it is
 - How to access it
 - Different ways to display it
- Ways to run the model

Takeaway

Basic understanding of model parameters, outputs, and how to run the model

OG-ZAF Inputs

Two types of inputs

Parameters and arrays: Necessary info for model simulation

- Incomplete description in [OG-Core documentation](#) and in [OG-ZAF documentation](#)
- Best description in OG-Core [default_parameters.json](#) file
- Other inputs, such as demographics, are created with other files like [parameters.py](#) in OG-Core, and [calibrate.py](#) in OG-ZAF

Default parameters and parameters object

- Go through OG-Core `default_parameters.json`
- Instantiate a default OG-Core parameters object in notebook
- Go through OG-ZAF
`ogzaf_default_parameters.json`
- Update the parameters object in notebook to OG-ZAF default
- Show how to update and change parameters in scripts

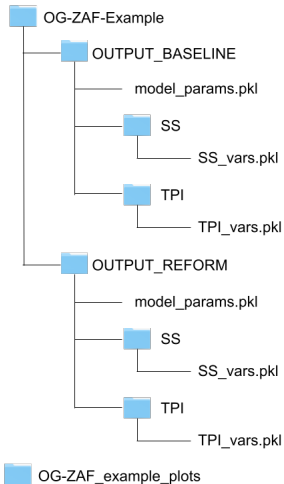
OG-ZAF output

Two main output files for each Simulation

- `SS_vars.pkl`
- `TPI_vars.pkl`

Notebook

Go through output and image objects and show automatic functionality



Ways to run OG-ZAF

- 1 (Local) Clone/download all repository files
 - Best for developing and customizing
 - Create `ogzaf-dev` conda environment
 - Run either with Python scripts or in Jupyter notebook
- 2 (Local) `pip install ogzaf` from PyPI.org
 - Best if only want parameter changes, and don't need to change underlying model
 - Run either with Python scripts or in Jupyter notebook
- 3 (Cloud) Run in Google Colab using `pip install ogzaf`
(<https://tinyurl.com/2clk62zl>)