**READ ME**

**Stepladder Chapter R code-2020 update**

This workflow uses three data sources to measure migrant stocks as analyzed through the lens of the Human Development Index. Migrant stock data has been updated to reflect the 2020 DESA data release.

Files below are listed in order of recommended workflow.

*Data cleaning/wrangling*

* **data1\_2020.r—**Loadand clean bilateral DESA stock data
* **data2\_2020.r—**Load and clean destination DESA stock and total pop data
* **data3\_2020.r—**Load and clean HDI and UNHCR datasets
* **data4\_2020.r—**Join DESA, HDI, and UNHCR datasets and prepare for viz.
* **data5\_2020.r—**Filter dataset for ECOWAS countries
* **data6\_2020.r**—Filter dataset for Schengen countries

*Visualizations/tables*

* **plot1\_2020.r—**Plots for the global overview immigrant/emigrant figures
* **plot2\_2020.r—**Plots for the “To-between-from” HDI classifications
* **plot3\_2020.r—**Plots for the ECOWAS and Schengen area figures
* **tab1\_2020.r—**Generates table for the regional distribution of stepladder migrants
* **tab2\_2020.r—**Generates table for the top 20 immigrant/emigrant stepladder countries

*raw data*

* **Human Development Index (HDI\_2019)**
  + Raw HDI index numbers downloaded from HDI website.
* **population**
  + Refugees and asylum-seeker data downloaded from UNHCR website in Oct 2020.
* **undesa\_pd\_2020\_ims\_stock\_by\_sex\_and\_destination**
  + Total stock for each country in each year. Downloaded directly without modification.
* **undesa\_pd\_2020\_ims\_stock\_by\_sex\_destination\_and\_origin**
  + Bilateral stocks for each country in each year. Downloaded directly without modification.
* **ecowas.csv**
  + Database tracking membership in ECOWAS across years. Compiled from <https://www.ecowas.int/about-ecowas/history/>.
* **schengen.csv**
  + Database tracking membership in Schengen across years. Compiled by Adam from <https://www.schengenvisainfo.com/schengen-agreement/>.