



Exercise 1

Social Inequality

Deadline: Please upload your assignment by Tuesday (**February 13, 5 p.m.**) Upload one file only (pdf). Include the R-code into the Appendix. Do not forget to cite the data. Further, integrate at least one reading into your discussion (see moodle). Use APA-style when you cite the reading(s). Label all figures and tables.

Exercise 1.1 (data preparation).

Proceed as follows:

- DATA00: Load the ISSP-data from 2019.¹
- DATA01: Select a country of your choice.
- DATA02: Keep the variables of interest (household income for country of interest, number of adults, number of persons in the household, age).
- DATA03: Delete all cases with missing information on your key variables of interest.
- Generate the new variables that you require for your investigation (see Appendix).
- Report the original and final sample size (analytical sample) for the country of choice.
- Make yourself family with the data: How large is the share of older persons (age 60 and older) in the population. How large is the household size on average?

Exercise 1.2

- a) Calculate the equalized median income (based on modified OECD-scale). How large is the share of persons at risk of poverty (defined as 60 % of the median net equalized household income)?
- b) You are adopting an income orientated and relative poverty measure for your investigation. Is that a suitable approach for your country of choice? (max. 200 words)

Exercise 1.3

- a) Do you think that age matters for poverty in your country of choice? Formulate a testable hypothesis.
- b) Calculate the at-risk-of-poverty ratio by age. Distinguish the following age groups: 20-39, 40-59, 60 and older.

Exercise 1.4 (optional)

- a) How large is the at-risk-of-poverty ratio by number of children in the household? Distinguish those without children, with one or two and those with three and more children.
- b) There is a debate of whether national or subnational units should be used to define poverty. Is this a relevant consideration for your country of choice? How do patterns differ if you use different levels for rural and urban areas? Please distinguish only urban and rural places.

¹ <https://www.geis.org/en/issp/home>

Appendix

Variables in ISSP 2019

Variable	Label
Country	Country ²
AT_INC	household income Austria
AU_INC	household income Australia
BG_INC	household income Bulgaria
CH_INC	household income Switzerland
CL_INC	household income Chile
CZ_INC	household income Czech Republic
DE_INC	household income Germany
DK_INC	household income Denmark
FI_INC	household income Finland
FR_INC	household income France
GB_INC	household income Great Britain
HR_INC	household income Croatia
IL_INC	household income Israel
IS_INC	household income Iceland
IT_INC	household income Italy
JP_INC	household income Japan
LT_INC	household income Lithuania
NO_INC	household income Norway
NZ_INC	household income New Zealand
PH_INC	household income Philippines
RU_INC	household income Russia
SE_INC	household income Sweden
SI_INC	household income Slovenia
SR_INC	household income Suriname
TH_INC	household income Thailand
TW_INC	household income Taiwan
US_INC	household income United States
VE_INC	household income Venezuela
ZA_INC	household income South Africa
HHADULT	Number of adults in HH
HOMPOP	Number of persons in HH
URBRURAL	Rural or urban ³
AGE	Age of respondent

² 36. AU-Australia 40. AT-Austria 100. BG-Bulgaria 152. CL-Chile 158. TW-Taiwan 191. HR-Croatia 203. CZ-Czech Republic 208. DK-Denmark 246. FI-Finland 250. FR-France 276. DE-Germany 352. IS-Iceland 376. IL-Israel 380. IT-Italy 392. JP-Japan 440. LT-Lithuania 554. NZ-New Zealand 578. NO-Norway 608. PH-Philippines 643. RU-Russia 705. SI-Slovenia 710. ZA-South Africa 740. SR-Suriname 752. SE-Sweden 756. CH-Switzerland 764. TH-Thailand 826. GB-Great Britain 840. US-United States 862. VE-Venezuela

³ 1 A big city 2 The suburbs or outskirts of a big city 3 A town or a small city 4 A country village 5 A farm or home in the country

New Variable

Name	Label	Realizations	Type
TOTAL	Number of persons in household	0, ...	Numeric
ADULT	Number of adults in household	0, ...	Numeric
OTHER	Number of adults minus 1	0, ...	Numeric
KIDS	Number of children in household [TOTAL-ADULT]	0, ...	Numeric
INCOME01	household net income in local currency	0, ...	Numeric
INCOME02	Equivalent net household income in local currency ^{4 5}	0, ...	Numeric
AGE_C	Age categorized	<ul style="list-style-type: none"> • 20-39 • 40-59 • 60 and older 	Factor
POOR	Poverty measure	<ul style="list-style-type: none"> • Not poor • Poor 	Factor
URBAN	Rural or urban?	<ul style="list-style-type: none"> • Rural • Urban 	Factor
KIDS_C	Number of children in household	<ul style="list-style-type: none"> • 0 children • 1 - 2 children • 3 and more children 	Factor

⁴ The weights for the modified equivalent scale are: 1 First adult; 0.5: Further adults; 0.3: each child. See: <https://www.oecd.org/economy/growth/OECD-Note-EquivalenceScales.pdf>

⁵ Note that the data only includes income brackets. For each income bracket, the midpoint of the bracket is given in the data. Use the mid-point of the interval for your calculations. Note also that the ISSP is not a household survey. Household weights should be used to make the analysis representative on the household level. We ignore that aspect for our analysis.