What’s Space got to do with it?

An Economic Geography Perspective on local Inequalities

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How do we treat inequality in Economics?

We are interested in:

- Overall dispersion in an economy—Gini!
- Top income shares
- Gender inequalities
- Equality of opportunity, social mobility, many more

The *unit of observation* is given: The country level

...even when we are using individual level data (SILC, HFCS, ...)

Implicitly assuming a kind of spatial homogeneity within the country

...or masking geographic variation
Recently, we have seen some really cool applications:

- **wid.world**: A country-level database for (among others) inequality measurements

- **Related**: Distributional National Accounts (DiNA)
  - Again: country-level, potential regional accounts?

- **Growth incidence curves**
  - Milanovic: World, but with regional (country) interpretation
Ex. Growth Incidence Curves for Senegal

Kireyev (2017)

(Total population)  (Urban/Dakar)  (Rural)
You are (dis-!) regarding space as a *data container*

You are implying that this container is a sensible level to answer question X

**Historically:** “Regional Inequality” in terms of between country convergence
  - Related: Data-availability. If you only get country data, you use these data

**Issues with space-as-a-container (SaaC)**
  - Affects the questions we ask
  - Affects the results we get
  - Affects the conclusions we draw
Economics, meet Regional inequality

Geographers have also cared about inequality questions...since the 60s (and earlier!)
Space as a major category of thinking: Explicit treatment in analysis
Affects the...questions these disciplines ask

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Taking a closer look: Local inequalities in the U.S.
Rule #1 of the EconGeo club: Lower geographic level, less data

Small units for “neighbourhoods”: tracts, block groups, zip codes

- Option 1: Internal Revenue Service on ZIP code level
- Option 2: Census data on tract (block group) level

Census publishes Gini and income brackets for periods of 5-years (disclosure control)
Estimating neighborhood inequality

- To get a better understanding of local inequality, we need better measures (n/a in the Census)
- Since Census data ≠ survey data: Under-reporting at the top might be an issue

Estimate **one million top-corrected, regional income distributions** using Generalized Pareto Curves

Automated method on high performance cluster, unsupervised crosswalking, implemented in R
Theil(National)\textsubscript{2010-2018} = 0.46 \rightarrow 0.485
Global Markets: Local Rents

National inequality is a tale of global markets and local rents
- Effects in Superstar cities: New York (Finance), LA/Miami (Coastal housing), SF (High-tech)
- Inequality increase in 1% tracts accounts = national increase

How does this affect local neighborhoods?
- Let’s take a closer look at the Silicon Valley example:
Digitization opens up global markets, where do rents flow?

Concentrated feedback into communities, altering distribution

Changing environments: Housing prices, pollution (traffic/commute), infrastructure (schooling), living spaces (Airbnb!)
Three Take-aways

♦ Inequality: Not only multi-scalar, but **multi-level**

- **Data**: small-area data to better understand **inequality processes**
  (local interaction, agglomeration effects, ...)

- **Method**: **Combine evidence** from levels
  (Spatial econometrics, Hierarchical modelling, ...)

- **Theory**: Understand how lower level phenomena **influence** observations at **larger scale**