

# Efficiency and Welfare in a Spatial Economy

Donald, Fukui, & Miyauchi (2023)

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October 2023

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  1. characterize inefficiency w/ and w/o preference shocks (cf. Mongey and Waugh, 2023)
  2. first- vs. second-best (cf. Fajgelbaum and Gaubert, 2020)
  3. Hulten-like welfare response to shocks (cf. Dávila and Schaab, 2023)
  4. identification of sufficient statistics (cf. Davis and Gregory, 2021)
  5. quantitative example (transfers between U.S. states)

# Summary

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- **Key idea:** dispersion of marginal utility ( $u'$ ) in spatial equilibrium (even w/o externality)
  - *first best:* equalize  $u'$  by reallocating **goods** and **people**
  - *second best:* only **goods**  $\rightarrow$  equalize  $u'$  vs. inducing moves to recipient locations

## What's the *missing* market?

“The source of inefficiency is the dispersion of marginal utility of income, arising from **market incompleteness** inherent in spatial equilibrium models.”

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  - **alternative**: “Conditional on a location's characteristics, a location with higher population has lower average flow utility, since the marginal agent has a lower preference to live in that location. In that sense, preference heterogeneity acts like a **congestion force** ...”  
(Desmet, Nagy, and Rossi-Hansberg, 2018, p.912)



## A few more comments

1. “a **general class** of spatial equilibrium models”: can you **characterize** conditions?  
(cf. *universal gravity* class of Allen, Arkolakis, and Takahashi, 2020)
  - how does **housing** fit?
  - do results break down if space is **continuous**?
2. quantitative: showed how big the transfers would be, but can you say ...
  - what's the resulting **dispersion** in marginal utilities?
  - how much **pop. reallocation** is induced?

## References

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