

# Agent-Based Computational Models

Peter Howitt  
Brown University

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Computational models of many interacting, heterogeneous agents, each endowed with simple behavioral rules permitting action in unknown complex environments, with no direct restrictions on aggregate outcomes.

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- Ashraf, Gershman and Howitt (2016)
- Tesfatsion-Judd Handbook of Computational Economics (2006)

# Why in macroeconomics?

Autonomy and spontaneous order

# Where is the comparative advantage of ABM?

1. Costs of inflation

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1. Costs of inflation
2. Systemic breakdown
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4. Heterogeneity

# Two methodological issues with ABMs

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2. What about the Lucas critique?



# Conclusions

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2. A central bank needs more than one model