

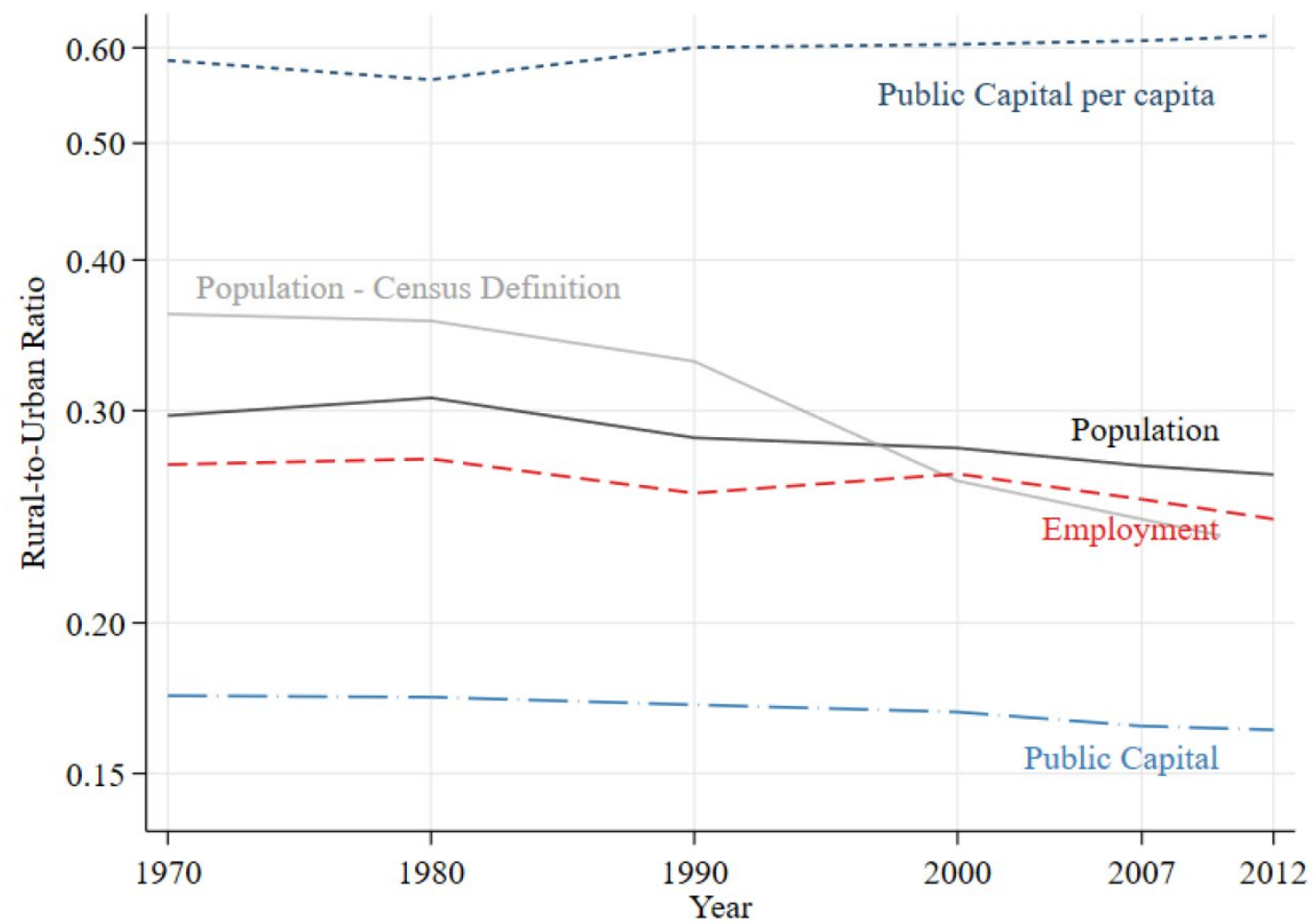
The Value of Rural and Urban Public Infrastructure

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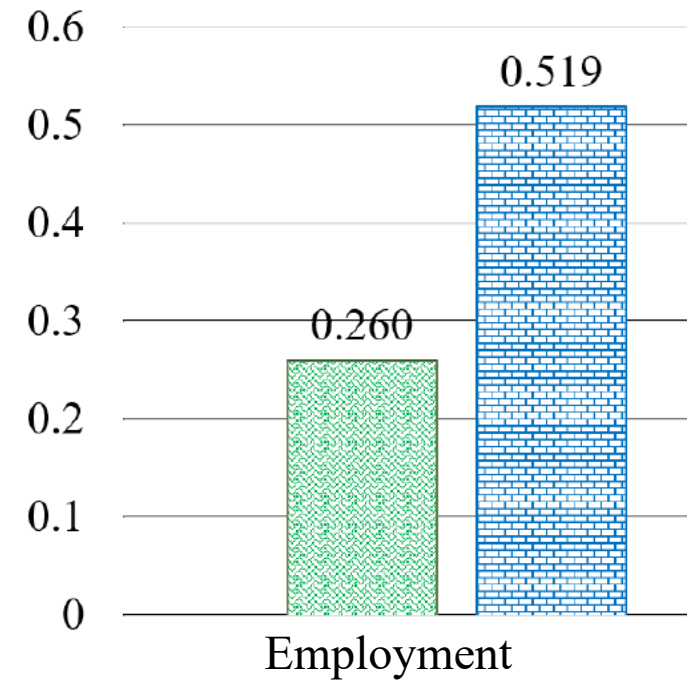
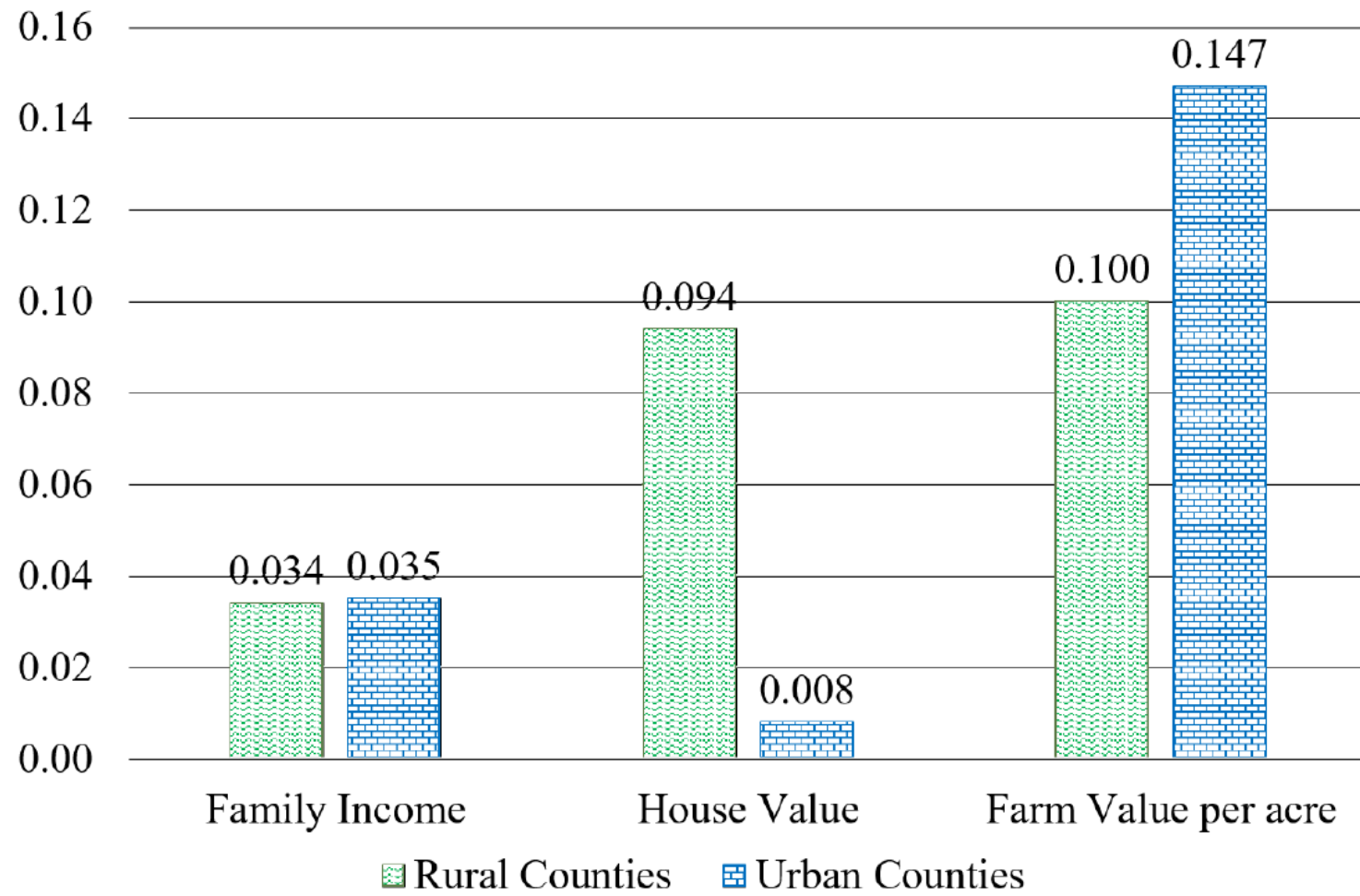
What is the value of infrastructure?

- ☐ How do public investments impact local communities?
 - employment, incomes, housing, land values...
- ☐ What is the return on investment in all its forms?
 - Productivity (3 Kinds): Agricultural, other tradables, non-tradables
 - Quality of Life: non-market, does not show up as income
- ☐ Who benefits from these improvements? Landowners? Residents?
- ☐ How do results in rural areas differ from urban areas?

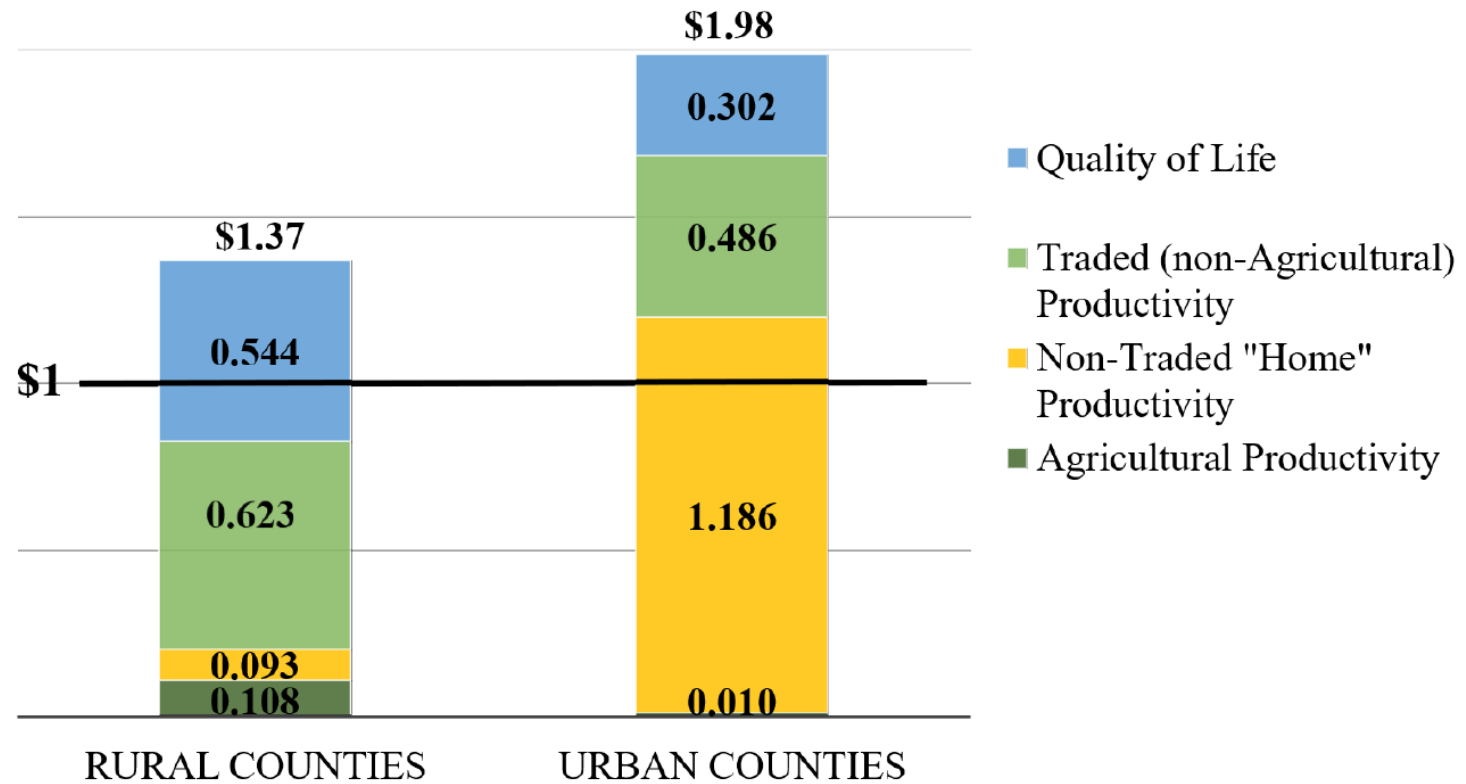


How do economic quantities change as public capital stocks rise and fall?

- ❑ County Area Finance (Census) data from 1957 to 2012 in 5-year frequency
 - Public capital stock measured by adding investments, and depreceating them over time
- ❑ Estimates depend on relationship observed within counties (fixed effects)
 - Also control for demographic changes and state-level tax and fiscal changes
 - Account for spatial correlation in potential economic shocks
- ❑ Estimates valid if investment largely driven by politics and non-economic factors
 - Overstated to the degree that investment anticipates future growth
 - Understated if infrastructure benefits people outside county
 - Might also may merely shift activity away

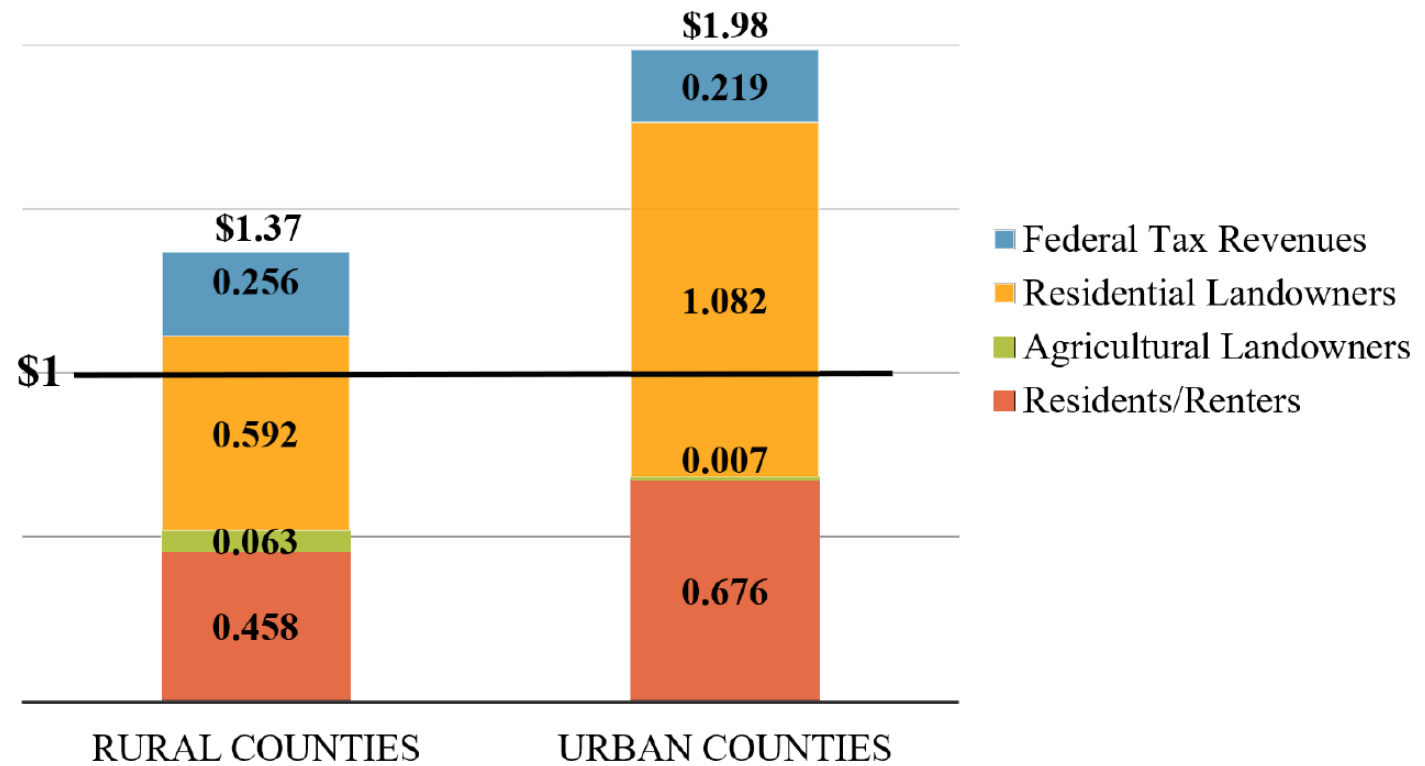


The average dollar invested in public infrastructure creates



(a) Values across Households and Firms

The average dollar invested in public infrastructure creates



(b) Benefits across Agents

Conclusion

- ❑ Infrastructure investments appear to payoff in both rural and urban areas
 - Return to local residents may be higher in urban areas, but spillovers may differ
- ❑ Returns vary in form
 - In rural areas, infrastructure improves quality of life first, jobs second
 - In urban areas, it makes housing much more accessible, lowers cost, but also boosts jobs and quality of life
- ❑ Benefits boost property values substantially
 - But benefits exceed increases in housing costs, helping those who only rent, too
 - Some payback in higher federal tax receipts