Macroeconomic Implications of Coholding

by Michael Boutros and Andrej Mijakovic

Discussion by Enzo A. Cerletti

Central Bank of Chile*

The Micro and Macro of Financial Intermediation
October 2025

*The views and conclusions presented in the paper are exclusively those of the author and do not necessarily reflect the position of the Central Bank of Chile or its Board members.

Summary of the paper

- Households with the same **net** liquid wealth have heterogeneous **gross** holdings of credit card debt and liquid assets
  - At any level of net wealth, coholders have larger debt
  - More indebted households have lower **MPC**, lower **MPS**, larger **MPD** out of windfalls
- A model with **expensive debt** and **liquidity-in-advance constraints** can rationalize these findings ▸ Model intuition
  - In the model, households with low gross positions are *hand-to-mouth* (high MPC), while indebted households prioritize deleveraging in response to windfalls.
- Implications for fiscal and monetary policy
  - Fiscal stimulus programs have maximum immediate impact when targeting "true" hand-to-mouth households, while targeting debtors produces larger long-run effects.
  - Effects of monetary policy depend on its pass-through to active and passive rates.

General comments

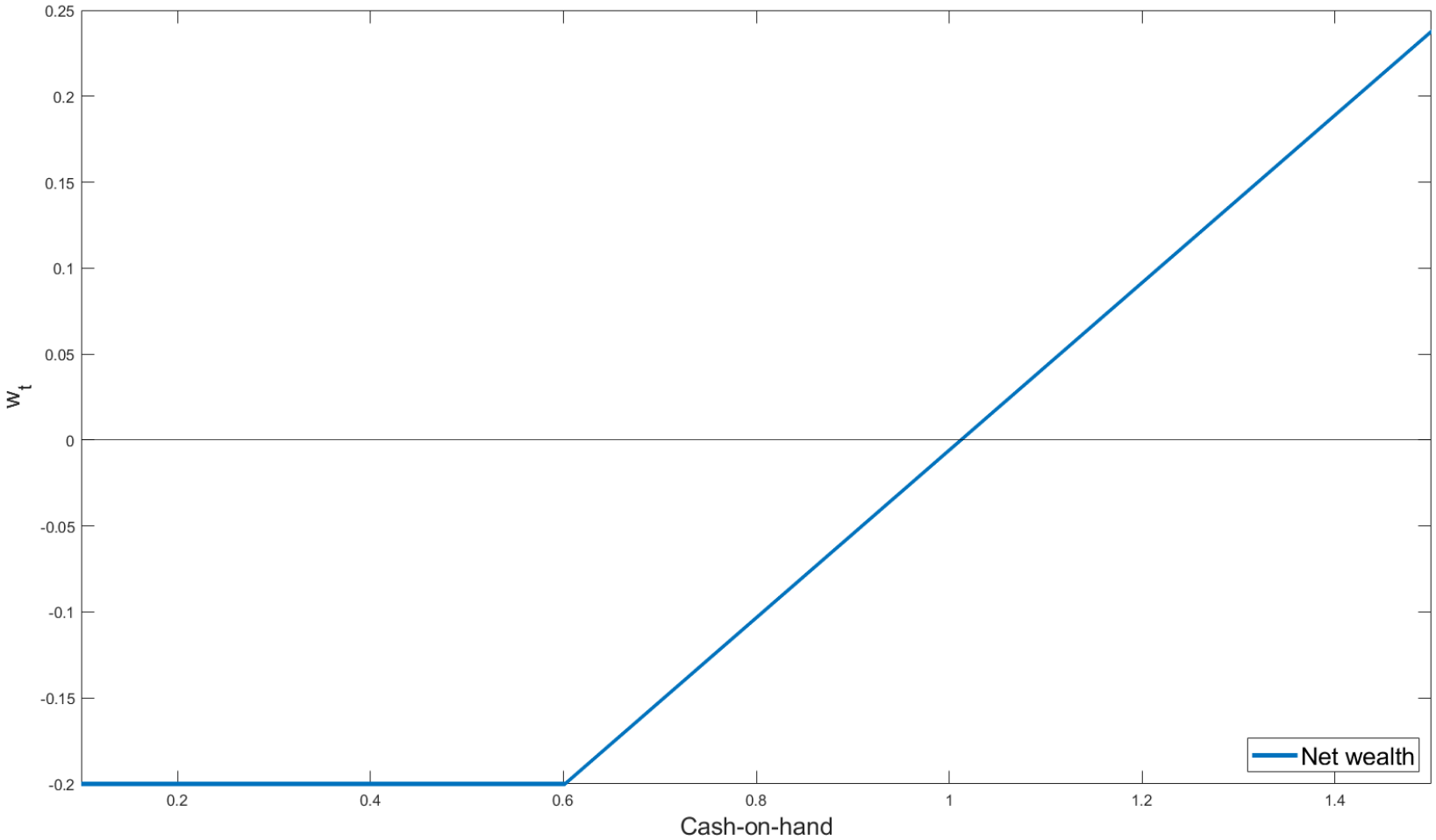
- Part of a growing, much needed literature on the macro implications of household finance
  - Rich empirical and micro-modeling literature on households' financial behavior
  - Fewer results on aggregate effects
- The distribution of MPCs is crucial to understand aggregate consumption dynamics, but we don't fully understand what drives MPC heterogeneity yet
  - Hand-to-mouth (Campbell & Mankiw, 1989), Borrowing constrained HtM (Zeldes, 1989), wealthy HtM (Kaplan & Violante, 2014), persistent HtM (Aguiar et al., 2024), liquid HtM (Olafsson & Pagel, 2018), loss aversion (Pagel, 2017), present bias (Lee & Maxted, 2023), temptation (Attanasio et al., 2024)
- I encourage further work on the aggregate consequences of HH Finance
  - HH Balance sheets as a channel: given a distribution, what is the aggregate response to shocks?
  - HH Balance sheets as an outcome: how do shocks and policies shape the distribution?

Challenges

- Is this paper really about coholding?
  - as a mechanism generating the results
  - as a measurement problem
- Deleveraging results consistent with papers focusing on (gross) debt (Lee & Maxted, 2023; Koşar et al., 2025).
  - Expensive debt and "no-man's-land" HtM present in Kaplan & Violante (2014)
  - **Calibration** ignoring coholding would missidentify them
- Additional insights from gross assets at odds with the data ▸ MPs and Assets
- Co-holding may be modest and short-lived (Gathergood & Olaffson, 2024). Is it an important force or a timing of measurement issue?
- Targeting results depend on the shape of the cost of debt ▸ Multiple debt instruments

Policy functions

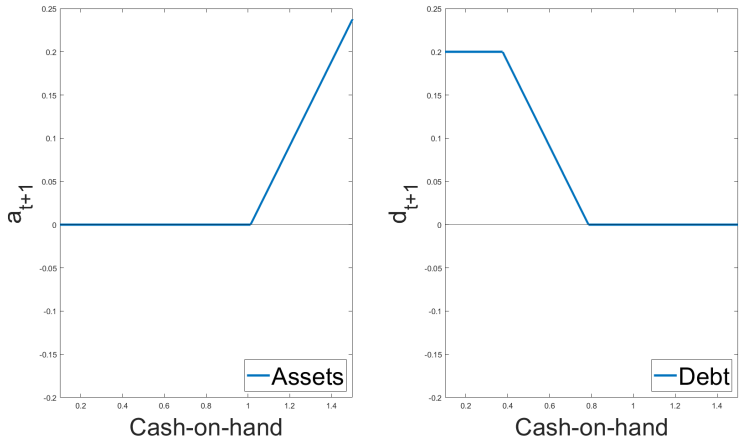
Single asset model



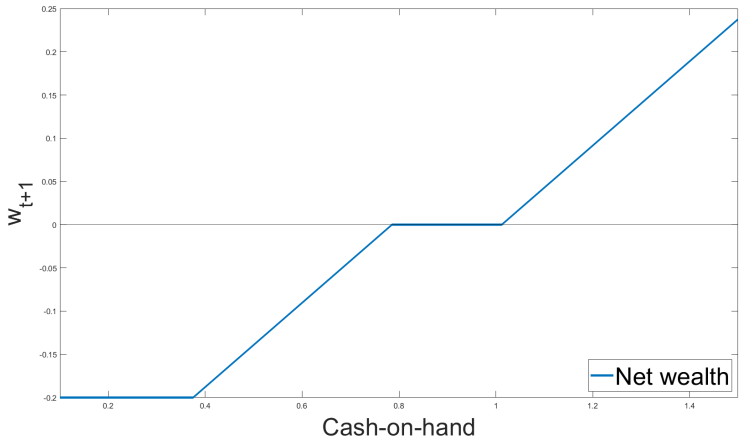
◂ Back

Policy functions

Expensive debt, without liquidity-in-advance constraints



(a) Gross positions

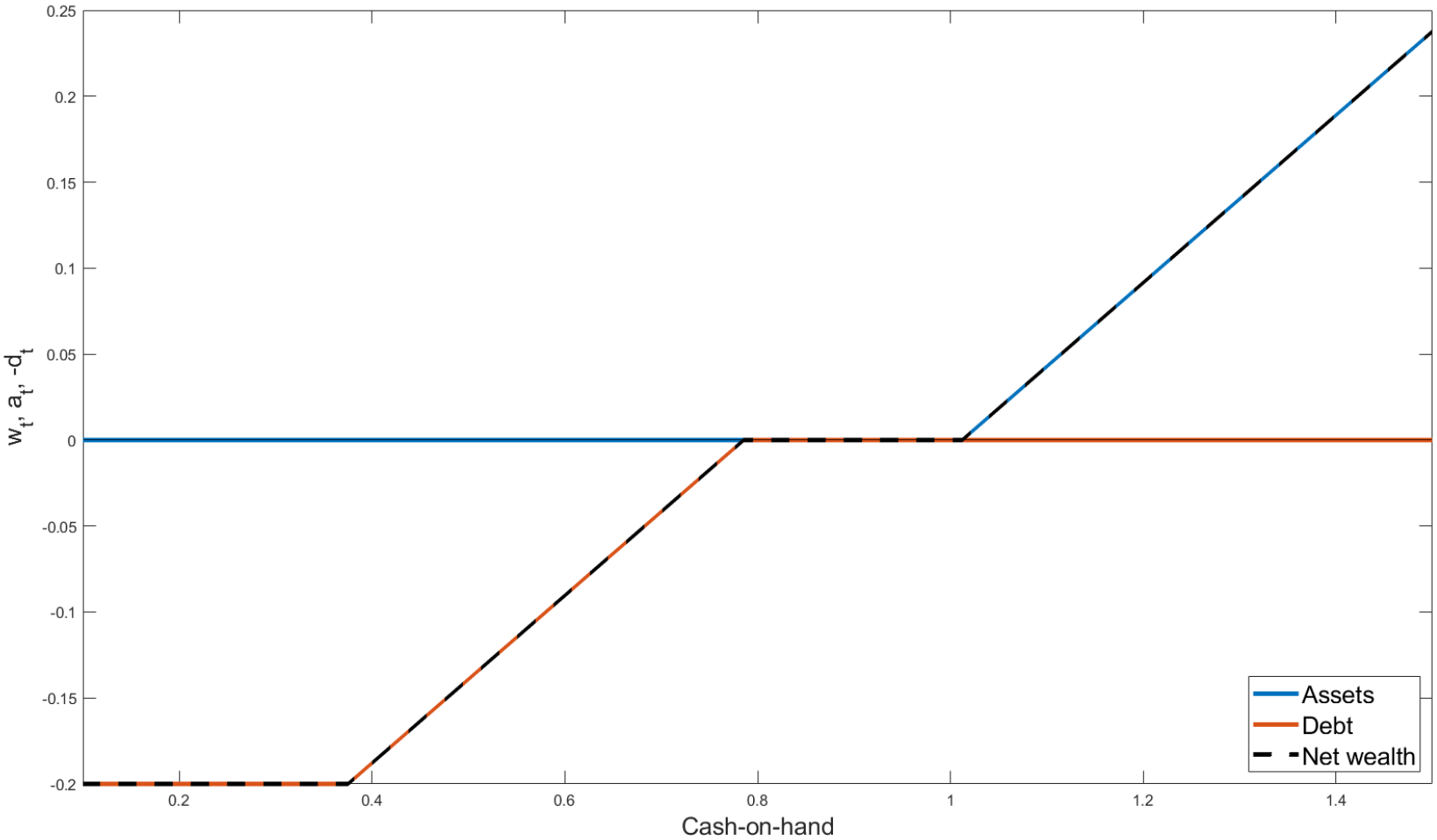


(b) Net wealth

◂ Back

Policy functions

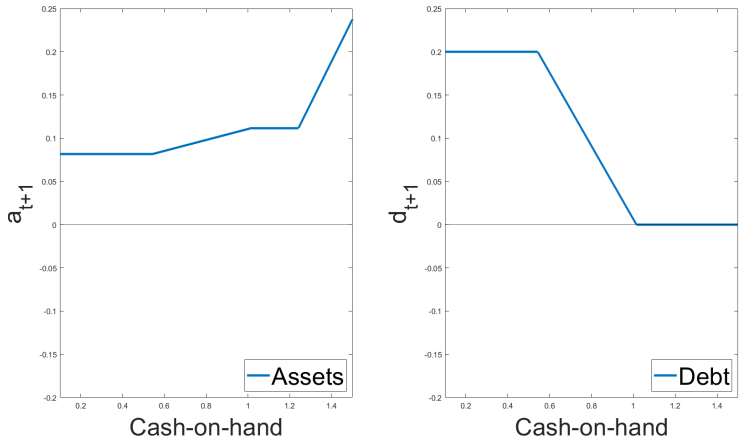
Expensive debt, without liquidity-in-advance constraints



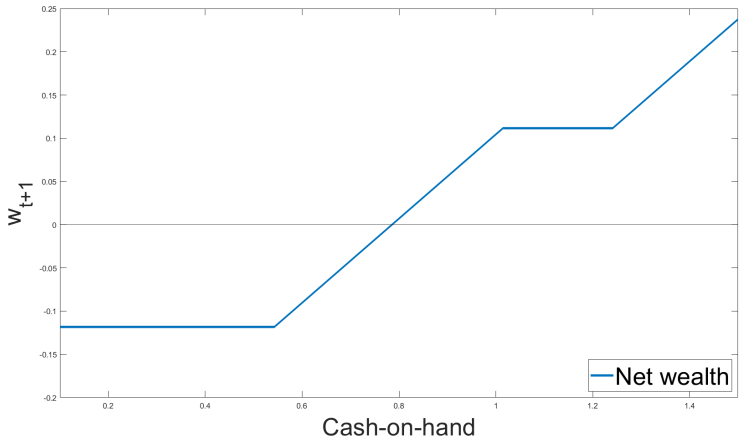
◂ Back

Policy functions

Expensive dent with liquidity-in-advance constraints



(a) Gross positions

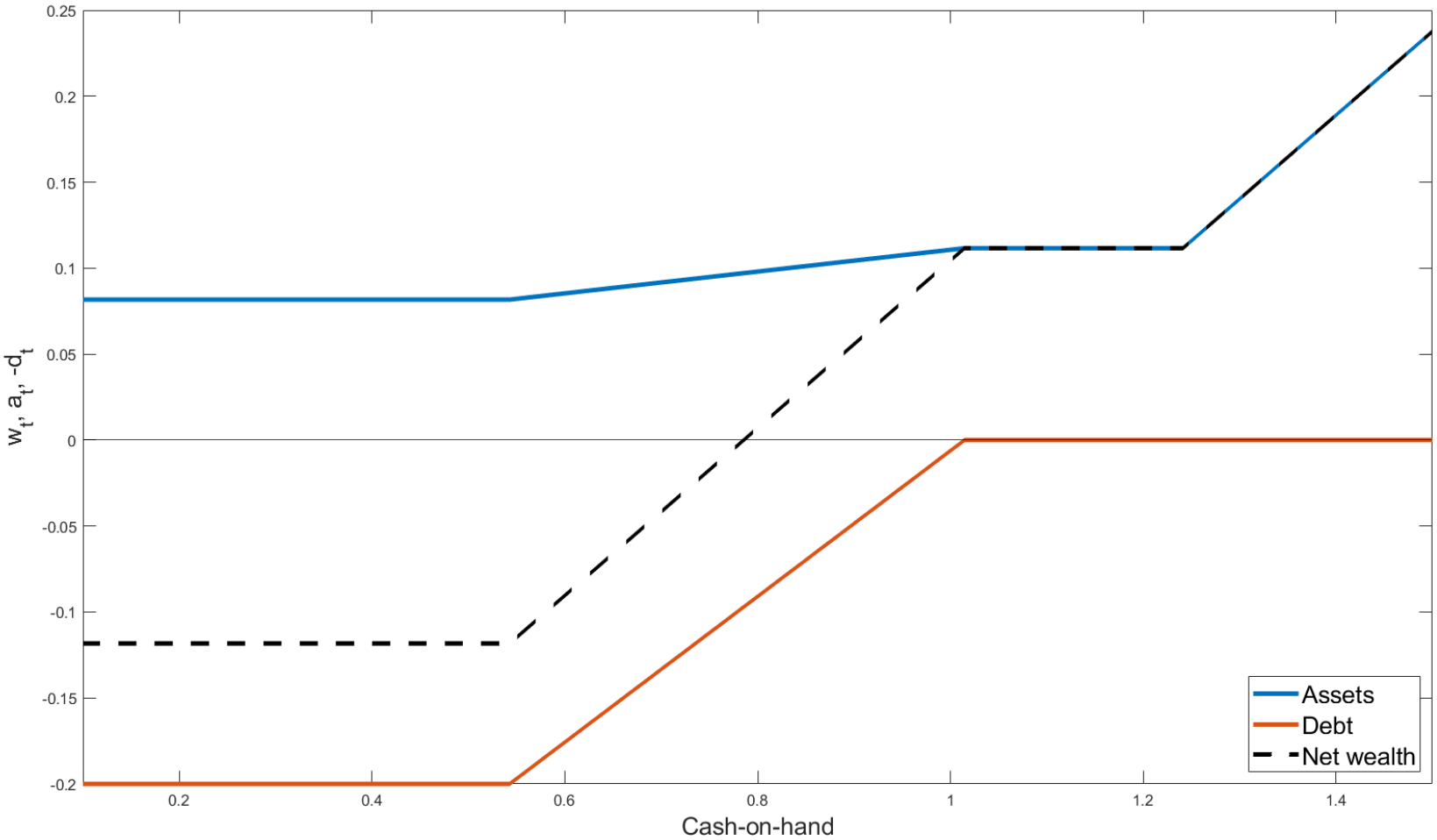


(b) Net wealth

◂ Back

Policy functions

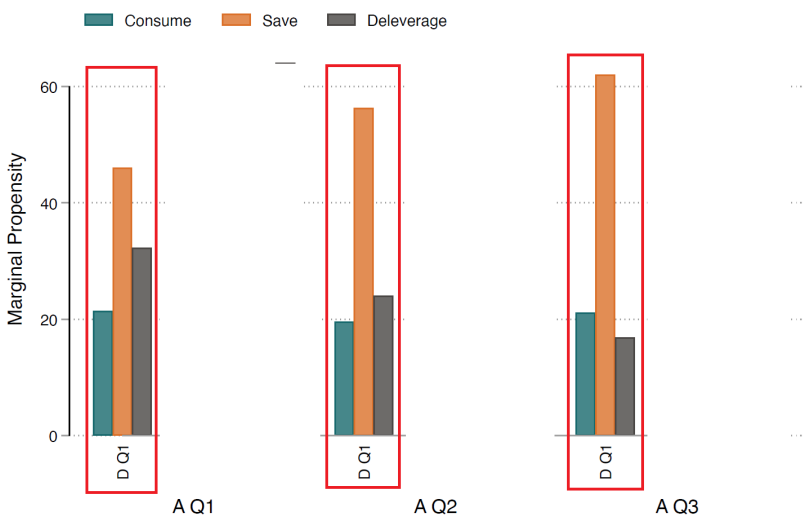
Expensive debt with liquidity-in-advance constraints, a



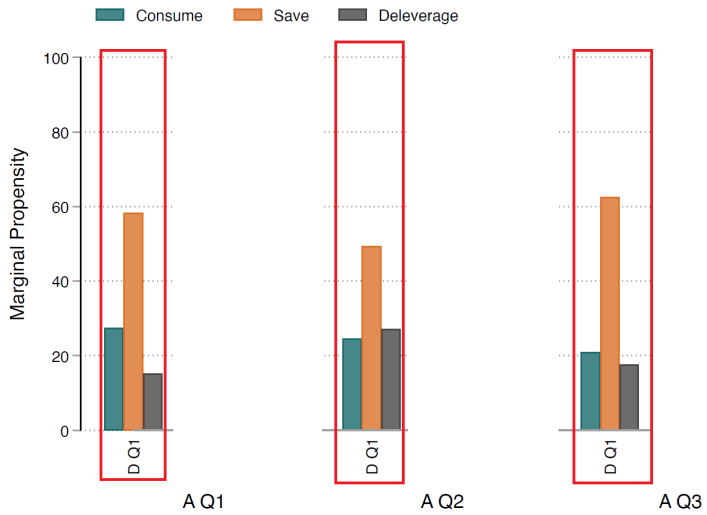
◂ Back

Marginal effect of liquid assets on behavior

Debt Tercile 1



(a) SCE Data

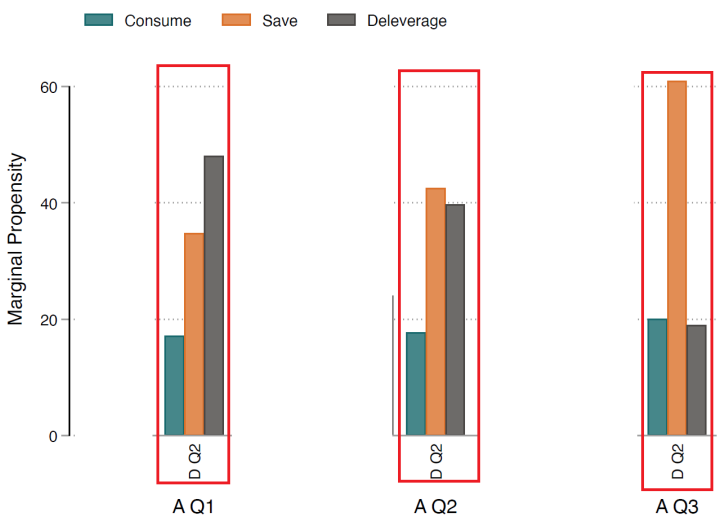


(b) Model

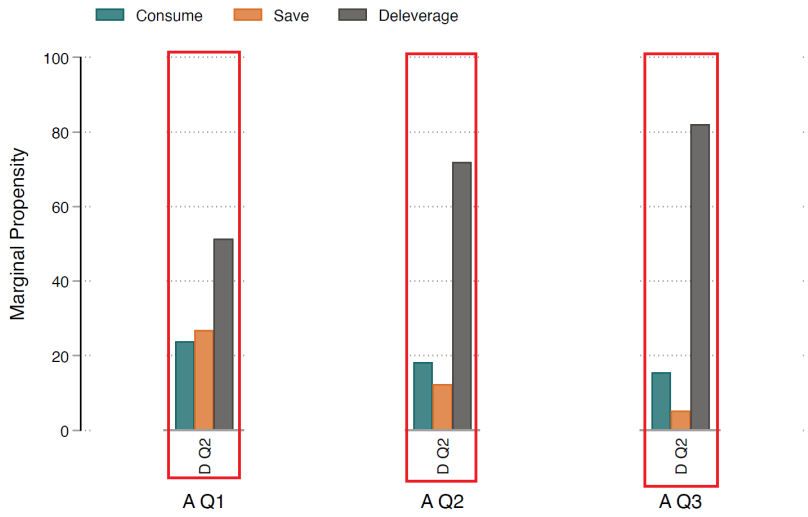
Back

Marginal effect of liquid assets on behavior

Debt Tercile 2



(a) SCE Data

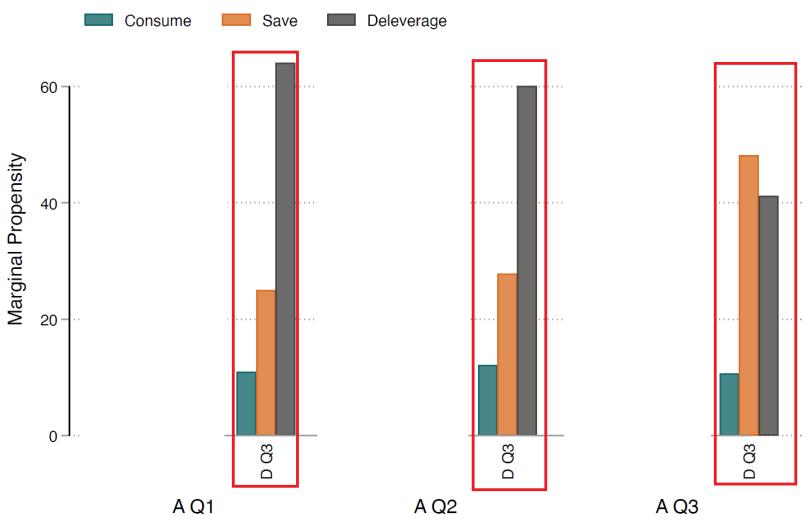


(b) Model

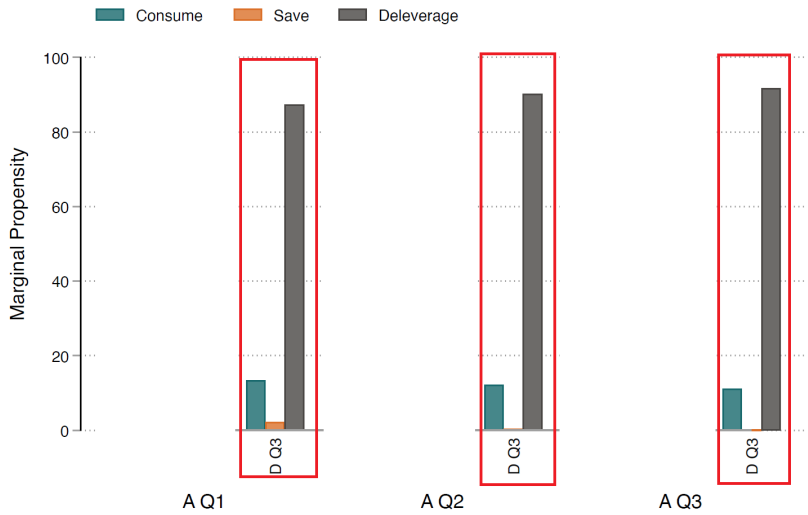
Back

Marginal effect of liquid assets on behavior

Debt Tercile 3



(a) SCE Data

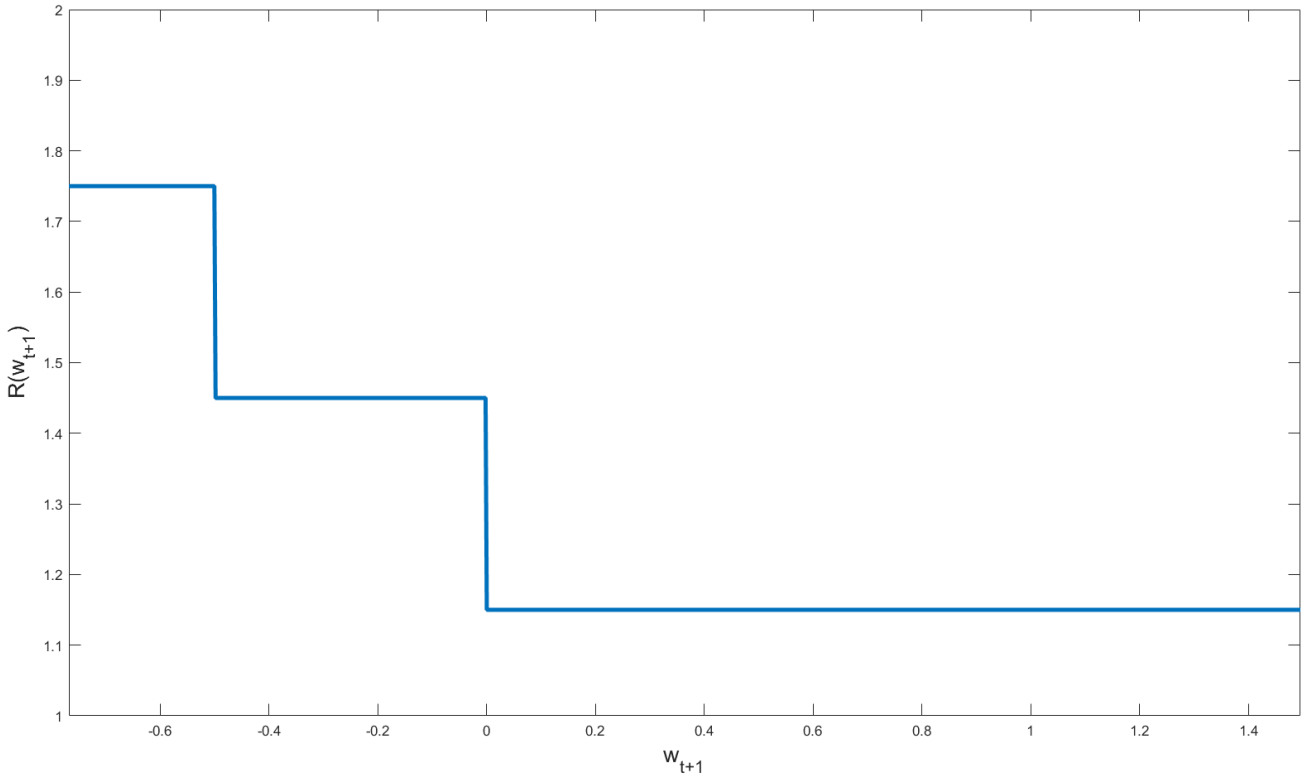


(b) Model

Back

Debt cost

- Define the indifference rate between saving and borrowing as $\hat{R}_t = \frac{U_c(X_t - 0)}{\beta E\left\{U_c(0 + Y_{t+1} - W^*_{t+2}(0, Y_{t+1}))|Y_t\right\}}$. Households are HtM whenever $\hat{R}_t$ falls in between R and $R + \delta$.
- With another, more expensive debt instruments, there will be an analogous, indebted HtM group for whom $\tilde{R}_t = \frac{U_c(X_t + \phi)}{\beta E\left\{U_c(-\phi(R+\delta) + Y_{t+1} - W^*_{t+2}(-\phi, Y_{t+1}))|Y_t\right\}}$ falls between $R + \delta$ and $R + d\delta + \delta'$.



Back