Discussion of "Asset Purchases and Heterogeneous Beliefs" by Gaetano Gaballo and Carlo Galli

> Cathy Zhang Purdue University

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# what the paper does

- studies how asset purchases (APs) affect asset prices in markets with heterogeneous beliefs and learning from prices
- model where rational investors observe noisy private signals about bond payoffs and infer information from market price (aggregates beliefs)
  - position limits (incomplete markets)
  - learning from prices  $\Rightarrow$  wedge between asset price and fundamentals
  - ▶ core mechanism: APs change price informativeness, thereby affecting wedge
- theory of how APs alter price informativeness, market outcomes, balance sheet implications

## main results and contribution

- 1. **non-monotonic price effect on APs**: small APs raise asset prices, larger APs decrease prices
- 2. central bank losses  $\Rightarrow$  implicit fiscal transfers to govt (issuer)
- 3. learning-from-prices externality amplifies market reactions
- 4. **price-targeting APs** reduce price informativeness and removes wedge but increase cost due to more frequent purchases

paper provides microfoundation for AP policy, highlights purely informational foundation for AP effectiveness

### outline of main comments

- 1. empirical relevance of mechanism
- 2. robustness to alternative signal structures, distributions

- 3. monetary-fiscal interactions
- 4. extension to dynamic, multi-period setting

### comment 1: empirical relevance of mechanism

- ▶ core mechanism: price-fundamental wedge due to learning
  - can wedge be measured in practice?
  - ▶ if not, useful to quantify wedge and what this means for observables
- evidence that price informativeness changes with the size of AP policy?
  - check high-frequency event data (e.g. around QE announcements) to validate mechanism

explore how price informativeness changes with AP scale

- ▶ model uses binary payoffs + normally distributed signals
- are results robust to richer signal structures (e.g., continuous state space, skewed, heavy-tailed distributions)?
  - does non-monotonicity in price persist with more general informational assumptions?
- what if agents differ in attention, learning rules, or other factors affecting signal processing?

#### comment 3: monetary-fiscal interactions

- model treats govt bond supply as exogenous
- ▶ in practice, sovereign debt issuance endogenous, often strategic
  - ▶ APs affect cost of govt borrowing which can alter issuance behavior, maturity structure, auction timing ...
- introducing feedback between central bank action and fiscal policy can clarify (new) amplification mechanisms or potential conflicts between monetary and fiscal authorities

## comment 4: dynamic extensions

- ▶ static one-period model may miss long-term dynamic considerations
- ▶ APs are often forward-looking and persistent
- ▶ how do beliefs evolve across repeated interventions?
- ▶ dynamic setup could inform optimal time-consistent AP policy

 model where heterogenous (bur rational) beliefs and learning from prices central to AP design

- new perspective on belief-driven asset pricing
- transmission mechanism of AP policy to asset prices
- ▶ just some food for thought to strengthen contribution
- ▶ many extensions possible on empirical, fiscal, and dynamic fronts