A Discussion on Measuring Costs and Benefits of Liquidity Regulation

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A few thoughts on the papers

- Liquidity regulation is part of the core reforms that were implemented following the crisis and have contributed to a significantly stronger and more resilient financial system
- Two very interesting and thoughtful papers that discuss the costs and benefits of liquidity regulation, from a mostly theoretical perspective
- Both papers do a terrific job of taking a holistic, equilibrium approach—key to the question on hand

A few thoughts on the papers (cont'd)

- Van den Heuvel (2018) uses a standard general equilibrium growth model
 - Captures the special role of banks as liquidity providers
 - Explores the role for capital and liquidity regulations, and the degree to which they are complements or substitutes
 - Specifically focuses on the social costs and benefits of each
 - On the cost side, these regulations reduce the ability of banks to create net liquidity and impact investment and economic activity
 - On the benefit side, they limit the moral hazard on the part of the banks (taking excess credit or liquidity risk)
 - Captures the potential migration of activity to non-bank intermediaries
 - Nice connection to the literature on supply of safe assets
- Brings US data to calibrate the welfare costs more specifically
- Concludes that liquidity requirements are costly if high-quality liquid assets are in limited supply and have important alternative uses; and that compared to capital requirements, liquidity requirements entail much lower social costs but their financial stability benefits are also narrower.

A few thoughts on the papers (cont'd)

- Miller and Sowerbutts (2018) use a simple bank run framework with two key features
 - Solvent banks can fail due to illiquidity
 - Banks funding costs are endogenous and concurrently decrease with run risk (increased holdings of liquid) assets (this is novel!)
 - Determine the return the investors demands, which depends on the bank's liquid asset holdings and the bank's choice of investment in the risky long-term asset.
- Similar to Van den Heuvel (2018) and other papers, capture the cost of liquidity regulation as foregone investment in the more profitable long-term asset, and where bank failures carry a social cost (larger than the private loss)
- Show that as a solvent bank holds more cash, then the probability of a run decreases (up to the point when it becomes run-proof). The bank can therefore pay less for its funding and that this can importantly offset some of the costs of liquidity regulation
 - Also show that this only holds above a certain equity threshold
- Presents suggestive empirical evidence to support how bank funding costs indeed seem to be negatively associated with holdings of liquid assets

A few comments/considerations

- Not clear how limited the supply of HQLA really is
- Liquidity and solvency are treated separately in Van der Heuvel (2018)
 - But having more liquid assets can reduce solvency risk; a la Calomiris and Wilson, 2004, for example, or Miller and Sowerbutts:)
 - And so financial stability benefits of liquidity regulations may be understated in such a model
 - If we take the cost calculation as given, this would strongly argue in favor of liquidity regulation
- What about other benefits of liquidity regulations?
 - For example, Calomiris et al. (2015) show that, because the riskiness of "cash" is invariant to bankers' decisions about whether to invest resources in risk management, greater cash holdings improve incentives to manage risk in the portfolio of risky assets held by the bank. Moreover, maintaining cash in advance saves on liquidation costs
 - Adrian and Boyarchenko (forthcoming) also show liquidity requirements can be preferable to capital, as tightening the former lowers the likelihood of systemic distress without impairing consumption growth

A few comments/considerations (cont'd)

- What about the role of the lender of last resort (LoLR)?
 - Van der Heuvel does not feature a LoLR, and Miller and Sowerbutts feature a highly unrealistic LoLR (one, for example, who knows the solvency situation of an institution with a high degree of precision)
- To take a broader perspective on this question of capital vs. liquidity regulations vs. LoLR, I find the Stein (2013) framework to be especially helpful
 - Banks add social value by being liquidity providers, but this generates run risk, which in turn carries significant negative spillovers to the system
 - It is this externality that creates a motivation for a policy intervention!
 - Could use ex-post (LoLR) or ex-ante policy tools (liquidity regulation)
 - In a world where LoLR is not costless, there's a clear need for liquidity regulations (in addition to capital requirements)
- Carlson et al. (2015) also note the complementarity between the two tools using examples from the recent crisis
 - LoLR is key in a systemic stress
 - Liquidity regulations help directly address idiosyncratic liquidity stress and also provide time for LoLR and other authorities to assess the nature of the shortfall and arrange the appropriate response



- To conclude, let me just restate that liquidity regulation has contributed significantly to improving the resilience of the financial system
- A lot of interesting conceptual questions
- Thank you for the chance to read these two very thoughtful papers and be part of the discussion on these important topics