Targeting Systemic Liquidity Risk

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Who bears risk nowadays ?

- A concern: an increase in demand for absolutely safe assets may makes system less safe
- Obvious for short term funding
- Open issue: does secured financial credit also contribute to unstable access to funding ?
  - For the borrower as well as for the system

Liquidity as risk externality

- *A bank's unstable funding creates vulnerability for others, as it cause price drops, margin adjustments and deleveraging*
- A classic negative externality
- Public cost not internalized; private choice of credit volumes and liquidity risk is excessive
- Open issue on secured financial credit

Rollover risk and Contingent Risk

- *Rollover risk*: Short term wholesale funding
- Uninsured, packaged for rapid escape
- Uninformed, subject to panic
  - Designed to bear no risk, so also uncritical about banks’ credit choices
- *Contingent liquidity risk*: sudden outflows triggered by margin changes and collateral obligations (repo, derivative-related funding)

The Basel III response: Ratios

- Basel III propose buffers, net funding ratios
- These are under serious pressure: branded as too expensive

- Yet we need to address liquidity risk
- Bank funding at present is shaky: if central banks withdraw, many banks will only be able to fund very short term, or very secured

Limits of ratios

- Fixed ratios must be set high to contain any shocks
- Expensive in hard times, so much delayed
- NFR at serious risk, as more costly (and more effective in containing aggregate risk build up)
- Low fractional buffers (LCR) may survive, but ineffective: banks will simply borrow more
- Also, buffers are procyclical (cheap in boom times)

Using risk charges next to ratios

- Risk charges as preventive tools to target short term, uninsured debt
- Rate should decrease with maturity
  - Used in modest degree in UK, German bank tax
- Should also target contingent liabilities
  - At present, many not even reported !
- Targeting encumbrances is also necessary to includes the shadow banking sector

Countercyclical risk charges

- Preventive tool, less disruptive than strict limits
- May be low in normal times
- Low adjustment costs, *if adjusted preventively*
- Target exposures, not price measures
  - Robust to overconfident market prices
- Ensures monitoring of stock of gross contractual and contingent liquidity risk

II) Contingent liquidity risk

- Sudden liquidity outflows triggered by margin changes and collateral obligations (repo, derivative-related funding)

- Cheap because of contingent escape

Superpriority

- Bankruptcy law seeks orderly resolution; critical role of creditor stay
- The 1978 US code created exceptions for margins on futures/swaps, Treasuries repo
  - Immediate repossession of collateral in default
  - Exempted from prohibition of cross-default clauses, and fraudulent conveyance rules
- Major legal change: novel proprietary rights
  - Last example was creation of limited liabilty !

Safe harbor privileges

- Over 2002-2005, bankruptcy laws were changed in all EU countries and the US
- Safe harbor status extended to *all secure credit, any intermediary, all derivatives*
- ABS collateral enabled, extended "swap" definition to any option, even CDS
- Likely cause for massive 2004-08 boom in repo/derivatives

Are these privileges warranted ?

- Repossession undermine orderly resolution
- Offer a static gain: access to extra funding for distressed firm (by diluting old loans)
- May limit propagation on individual defaults
  - The New York Fed saw the LTCM crisis as a systemic event triggered by uncertain access to collateral
  - Original exemption to repo granted after the failure of a major Treasury market trader
- But enhances fragility in a systemic event

Repo growth makes unsecured lenders run faster, earlier

- Once more secured financial credit is extended, unsecured credit becomes diluted
- Naturally more vulnerable, run-prone
- Unsecured ABCP will run first (and faster)
- Repo runs came only in 2008; but repos did withdraw from backing riskier collateral
- Once repo run, it is the end (see Lehman)
- Yet even upon default, no counterparty risk: Lehman repo lenders sold collateral so fast, they did not lose a penny

Lessons from Lehman default

- The Monday default of Lehman Brothers led to a jump in risk spreads
- But the main jump in risk spreads came on *Tuesday and Wednesday, up to* two days after Lehmann’s default
- Monday saw repossession of at least 300 billion mortgage backed securities, immediately resold
- This triggered massive collateral calls on derivatives (AIG needed 60 billion in two days)

Externality effects of safe harbor provisions

- Why should collateral repossession lead to worse fire sales ?
  - Repo lenders not natural collateral owners, resell immediately
  - Rational to front sell, since all safe harbor lenders receive similar collateral at the same time
  - Fire sale incentives even worse than for distressed borrower, as repo sellers are not residual claimants (haircuts must be returned)
- Since crisis, unsecured lenders woke up and left: 2/3 interbank lending now secured

Collateralization and credit supply

- Bank funding market now insistent on (over)collateralization
- This suggests reduced debt capacity ahead
- Expanding secured financial credit does maintain access to funding initially, but also accelerate jitteryness of unsecured credit
- Many central banks are considering capping maximum amount of covered bond funding for their banks

Covered bonds and repo

- Covered bond as newest counterpart to repo funding, especially in Europe
- Comparable in degree of protection:
  - Direct claim on specific fenced out loans
  - In default, shares residual value as unsecured debt
  - Massive overcollateralization relative to repo (minimum 125%, average closer to 140%)
  - Dynamic collateral pledge

Dynamic collateral maintenance

- A remarkable credit enhancement: contrast with traditional collateralization/securitization, where asset quality tend to deteriorate over time
- Resembles role of changes in haircuts
- Undermines further access to funding in a bind
- European banks surely do not have enough assets to (over)pledge if unsecured credit evaporates
- Even usual long term bank lenders (insurers, pension funds) now seek collateralization

First step: record safe harbor

- *Front selling collateral runs* leads to risk shifting to other lenders and investors
- Yet secured financial credit is not even disclosed !
- Need to create public registry, as for all other proprietary rights
- Registration should be necessary condition to enjoy any privilege, especially since they have external effects

Second step: charge for privilege

- Not just fair: risk charges reduce excess creation, reduces risk of fire sales of collateral
- A clear, legally identified tax base which cannot be arbitraged !
- Ensures disclosure to other market participants
- Cannot be avoided by relocating transactions
- Covers any intermediary (unlike Basel)
- Easy to adjust counter cyclically

Third step: limit them

- At present, any asset may be securitized, the security repo-ed or back a derivative
- Thus *any market* may become exposed to sudden repossessions and rapid sales
- Asset markets when many investors rely on unstable funding cannot absorb fire sale, forcing intervention
- To avoid hostage situation, safe harbor status should be limited to qualifying securities
- May require quantity limits

Who will bear risk tomorrow

- Investors now spooked by liquidity risk
- Seek protection by shortening maturity, demanding collateralization
- Less overall risk bearing capacity, increases demands on contingent liquidity support from the central bank
- As risk is sidestepped by market investors, the system inevitably becomes more brittle
- We need prudential tools on excess mismatch and collateralization

Conclusion: target and charge liquidity risk

- Surcharges as primary countercyclical tool
- Less disruptive to adjust than ratios (especially if *adjusted in timely fashion)*
- Target exposures, not price measures of risk
  – Robust to overconfident markets, risk shifting
- Helps target build up in gross liquidity risk
- Robust approach to financial innovation requires targeting contingent liquidity risks
- Critical role of safe harbor privileges

The ex ante costs of secured and short term funding

- Bank credit in US and EU grew faster than GDP in 2003-08
- Credit quality fell steadily
- How was this possible ?
  - Global imbalances fed demand for safe $ assets
  - Funding for the credit boom came from investors who bore no risk, did not bother to assess its use
- **Wholesale short term funding**
- **Collateralized funding**
  - Repo, derivatives which enjoy superpriority