COMMENTARY

Financial Regulation after the Crisis: How Did We Get Here, and How Do We Get Out?

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This paper makes very controversial points. Jerry Caprio argues that the attempts to improve banking regulation in the last 40 years have been totally misguided and we need to "reboot" the process. The paper focuses in particular on the Basel capital ratio regulation and argues that the regulation has grown more complicated without making the financial system any safer. Worse, the Basel's regulation was at least partially responsible for the global financial crisis. The approach to apply the same risk weights or the same risk management model for all the banks in all the countries ended up increasing correlation of banks' exposures. These problems intensified in Basel III, which makes the financial regulation more complex and less transparent. So Caprio recommends rolling back the Basel regulation and replacing the risk-weighted capital regulation with simple leverage ratio regulation supplemented by conditional convertible debt, or CoCos.

Caprio also points out some regulatory failures during the global financial crisis. The British Financial Services Authority did not intervene in Northern Rock in time and on the contrary allowed them to increase dividends shortly before the failure. The regulators in the United States did not act on widespread fraud in mortgage markets in the early 2000s or on the clear signs of more risk-taking by banks (such as NINJA loans). But the regulators do not seem to be held accountable. So Caprio recommends creation of a sentinel, which collects and disseminates information on financial regulation and supervision, so that the market can discipline the regulator. The idea is more fully discussed in Barth, Caprio, and Levine (2012).

Unfortunately, the analysis and recommendations in this paper have not become a consensus view. Basel III implementation is still going forward. Indeed the U.S. regulatory authority has just announced the final implementing regulation for the liquidity coverage ratio, which is a new part in Basel III,

for large U.S. banks. I have not heard that any country plans to create a sentinel, either. So the points made in this paper remain controversial.

But I completely agree with the author. Indeed I would go further and argue that what he suggests in this paper—getting rid of risk weights, requiring banks to issue CoCos, and making regulators accountable—are just the beginning. We should consider a lot more.

I divide my comment into two parts. The first part points out some financial regulations other than the capital ratio regulation that should also be reconsidered. The second part points out some recent attempts to improve financial regulations other than CoCos that may actually be useful and can be salvaged. So I argue the recent efforts by many including the people in this room were not a total waste.

First, let me point out some financial regulations other than Basel capital ratio regulation that should be reconsidered.

The first one is actually a part of the Basel III regulation: the liquidity coverage ratio regulation. Under this regulation, banks would be required to hold a large enough amount of high quality liquid assets to survive 30 days during a stress. The liquidity regulation has problems similar to the capital ratio regulation. In calculating the denominator of capital ratio, each asset is assigned a "risk weight" and the risk-weighted assets are calculated as the risk-weighted amount of assets. Similarly, the numerator of the liquidity coverage ratio is calculated as the sum of various liquid assets weighted by the "haircuts," which can be considered the liquidity weights of assets. For example, Level 1 assets such as cash and U.S. Treasury bills are given zero haircuts or 100 percent liquidity weight and Level 2A assets such as mortgage-backed securities guaranteed by the government-sponsored enterprises are given 15 percent haircuts or 85 percent liquidity weights. Just as the Basel capital ratio regulation made banks hold assets with the highest expected returns among assets with the same risk weights, the new liquidity coverage ratio regulation will make banks hold assets with the highest expected returns among the assets with the same liquidity weights, and hold assets with the highest liquidity weights among assets with similar risk-return profiles.

The liquidity ratio regulation also increases the correlation of asset holdings across banks, similar to the capital ratio regulation; this will actually lead to a more serious problem because the liquidity of many assets depends on the existence of a well-functioning secondary market. If all banks rely on the same type of asset to secure liquidity during a stress situation, all banks will try to sell the same type of asset during a stress, leaving no one on the other side of

the market, which makes the asset illiquid. In this case, the liquidity disappears exactly when it is needed most. In this sense, the problem is very similar to that of counting deferred tax assets as a part of capital, which became obvious during the banking crisis in Japan. The deferred tax assets disappear exactly when we need bank capital as a buffer.

So, it is better to replace the liquidity coverage ratio regulation with something less distortionary and simpler. One such candidate is the requirement to just disclose a simple liquidity indicator without arbitrary assumptions on haircuts and run-off ratios, as Shadow Financial Regulatory Committees of Asia, Australia-New Zealand, Europe, Japan, Latin America, and the United States (2013) proposed.

To reboot the Basel approach as Caprio suggests, we would need to go back 40 years, but to roll back the liquidity ratio regulation, we only need to go back four years at most, so it is worth consideration.

My next suggestion would take us back more than 40 years. An important reason we need any regulation on bank leverage is because monitoring by debt holders, which would limit leverage in many other industries, does not work in banking. In many countries, deposits and often other bank liabilities are insured or otherwise protected by governments, so the debt holders are indifferent toward bank risk-taking. Since the equity holders welcome risk-taking by banks, especially when the amount of equity is small, banks end up overleveraged in the absence of regulations that would limit leverage.

Protection of depositors, especially small deposits, is usually justified on the grounds that uninformed depositors may run on a solvent bank and create a self-fulfilling bank failure. But, in today's world, where developments in information and communication technology have substantially reduced the cost of acquiring information, I think we should at least question the traditional assumption that depositors are uninformed. If it is not too much to ask depositors to be informed about the financial health of the banks they deal with, then we may be able to get rid of deposit insurance and protection of bank liabilities.

Even if it turns out that it is still expensive for all depositors to be reasonably well informed, there are other mechanisms such as narrow banking that limits the amount of deposits to be protected. At least, there seems to be no justification for protection of large bank creditors, which is still observed in many countries.

The third area for reconsideration is that financial regulation often tries to achieve multiple goals. Caprio points out that the Basel capital ratio regulation tries to pursue three objectives at the same time: "keeping the banking system

safe, leveling the playing field for banks, and being responsible for management at the individual bank level." Then, he recommends that capital regulation focus on the first objective: keeping the banking system safe.

More generally the governments in many countries use the financial regulation to try to achieve various, sometimes conflicting goals. In the United States, the financial regulation has been used to promote homeownership (through mortgage financing system with Fannie Mae and Freddie Mac), to address spatial and racial inequality (mainly through the Community Reinvestment Act), and to achieve foreign policy goals (through the Office of Foreign Assets Control), just to name a few. Sometimes pursuing these objectives compromises the safety of the financial system, as was shown by the recent financial crisis that was partially caused by a housing boom fueled by long-identified problems with Fannie Mae and Freddie Mac.

I suggest we should consider freeing financial regulation from these social, foreign, and other policies. This suggestion comes out of my own research on zombie firms in Japan (Caballero, Hoshi, and Kashyap 2008). There, the financial regulators often encouraged the banks to continue lending to zombie firms so that they could continue employing the workers.

Moving on to the second part of my comment, although I agree with Caprio that the refinement of the Basel regulation following the global financial crisis is mostly in the wrong direction, there are some regulatory developments that could be useful in making the financial system safer.

The first one is stress testing, which many countries have used since the global financial crisis to determine the amount of capital that each bank needs to be well capitalized during a stress. The inspection of banks in Japan before the second round of public capital injections in 1999 was also a stress test, and it was useful in stabilizing the financial market at least temporarily. Hoshi and Kashyap (2010) include a more detailed discussion on this.

Unlike the capital ratio regulation, which looks at the current level of capital and is static in this sense, a stress test is dynamic and asks how much capital would be lost during a stress. Since we have often observed well-capitalized banks quickly become undercapitalized in a stressful economic condition, a stress test can provide additional useful information. A more important function of stress tests is to force banks to imagine future stress scenarios, which would help them and the regulators prepare and respond better when a stressful situation actually arises.

From this point of view, a "reverse stress test" in which a bank is asked to come up with a stress scenario that would make the bank insolvent is especially useful. Such a scenario is not easy to come up with, but the effort to come up

with an unthinkable but possible scenario where the bank would fail is really useful to prepare for a crisis.

A related regulation forces each bank to file a resolution plan. This is also worth keeping. One of the major problems in the latest financial crisis in the United States was the inability to close down a large financial institution without bringing down the whole financial system with it. The United States had a very efficient system to close down failed small banks, but the framework to deal with large troubled bank holding companies or investment banks did not exist. Thus, when Lehman Brothers failed in 2008, financial markets all over the world stopped functioning.

We observed similar problems for Japan in the late 1990s. Japan did not have a framework to deal with large failing banks, either. When large international banks such as the Long-Term Credit Bank of Japan (LTCB) and the Nippon Credit Bank (NCB) got into trouble, the Japanese regulators initially tried hard to prevent the failure. The Japanese government explicitly mentioned that they should not let a failure of Japanese banks destabilize the global financial system. We should give credit to the Japanese regulators back then for at least understanding the danger of letting internationally connected large banks fail. Eventually, Japan created a mechanism to nationalize large failed financial institutions temporarily and used it to nationalize LTCB and NCB in late 1998, which started the end of the crisis situation.

The fact that the regulators in advanced countries (or "formerly advanced countries") are now serious about coming up with resolution mechanisms and at the same time asking each financial institution to prepare a resolution plan (also called a living will) is promising. Although there are many remaining issues, such as how the national regulators should coordinate in a resolution of large multinational financial institutions, the attention being paid to the resolution mechanism is warranted.

In summary, the efforts for regulatory reform since the global financial crisis have not been a total waste of time. There are some promising developments. But, I also share Jerry's concern that the increasingly complex regulatory framework represented by the expansion of the Basel framework has been in the wrong direction. It would be a good idea to roll back the Basel guidelines and reconsider the financial regulation's foundation.

Finally, let me end my comment by reiterating the importance of politics which Caprio points out and Calomiris and Haber (2014) discuss in more detail. Most of our discussion of financial regulation, including my comment, is just economics. But politics is what determines financial regulation in the end. Jerry's paper argues that creation of a sentinel that would collect and publicize

the information on financial regulation and supervision could be the first step toward empowering taxpayers, who end up paying the cost of financial crises, but I am not optimistic. After all, taxpayers and the general public are more dispersed than other stakeholders and face serious collective action problems.

Moreover, the problem of financial regulation entangled with social policy is even harder to solve, because a significant portion of the general public believes that they benefit from the social policy aspects of financial regulation. Some of them would actually claim that financial regulation should be strengthened to promote those social goods. More research into the politics of financial regulation is very important and urgent.

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