



Goldilocks and the Fourth Way: Assessing Credit Risk for Capital Purposes

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One of the toughest challenges in financial regulation is how to regulate capital – in particular, at how granular a level to assess the risk of each asset. A leverage ratio requirement, in which all the risk weights are set to 1, has the benefit of simplicity but ignores risk and therefore both misstates financial condition and incentivizes riskier conduct. More risk-sensitive approaches, however, must either rely on banks’ own assessment of risk or empower government regulators to allocate capital by making the decision itself. Three approaches will be debated as the federal banking agencies implement the latest Basel framework, but there may be a fourth...

The first way is for each bank to assess the credit risk of the borrower both for its internal risk-management purposes and for capital purposes. The advantages are clear. The essence of competition in banking is competition in risk management. Competition encourages innovation, and a diversity in views on credit maximizes the ability of deserving borrowers to obtain credit. Banks also have deep resources and the best knowledge of their clients. The disadvantage is that a bank that is capital constrained might have an incentive to understate the risk for capital purposes, thereby lowering its capital requirements. While banks are subject to examination, the presumption of those who have this concern is that examiners will be unable to detect such behavior.

The second way is for government regulators to decide what the risk is for each borrower, thereby preventing any bank from adopting a model that might show lower risk and therefore require lower capital. As capital requirements rise, which they have, the government’s decision effectively determines which assets a bank can profitably hold. Government decision-making could take the form of individual decisions – akin to a Chinese model – or use of pre-set risk weights based on general types of borrowers – the so-called “standardized approaches” devised by a committee of regulators in Basel. The downsides are significant: diminished competition in risk management and therefore diversity of credit views; diminished incentives for innovation; and concentration of banking risk in assets favored by the government models. And of course, reaching consensus in Basel takes years or even decades, so standardized models cannot be adjusted if they are under- or over-reporting risk.

The third way is to maintain competition and private sector input while removing an incentive to cheat, which is what led the Basel Committee to allow the use of public ratings provided by credit rating agencies like Moody’s, Standard & Poors, and Fitch in setting capital risk weights. Here, the notion goes, those companies will compete to achieve the most accurate measures (primarily for risk management purposes, but with the incidental benefit of getting capital levels right), and will have no incentive to minimize capital requirements for banks. While this approach seemed sensible in theory, credit rating agencies have at times done a very poor job – partly because they lack the resources and expertise of banks, and partly because an “issuer pay” model gives them perverse incentives. Thus, in the wake of the Global Financial Crisis, Congress outlawed the use of credit rating agencies in setting capital requirements; so this third option is a live one for Europe and the UK but not the United States. While not the reason for Congressional action, another major problem with use of credit ratings is that only a small percentage of companies borrowing from U.S. banks are publicly rated; thus, basing favorable capital risk weights on good credit ratings necessarily disfavors small and middle-market firms versus large ones.

So, is there a fourth way – a way to leverage private sector innovation and resources; allow for prompt adjustments to adapt to new risks or new data; prevent any possibility of cheating; and expand the universe of companies that can be fairly evaluated? Until recently, the answer was no, but a live option now appears available. (Given the favorable review below, note that we have no affiliation with the company described.)

A company called Credit Benchmark has made it its business to collect one-year probability of default estimates from banks on corporate borrowers. To the extent that a company deals with multiple banks, each bank receives an anonymized report showing where its internal risk rating sits relative to others. (While banks vary in how they set the probability of default for each borrower, Credit Benchmark first creates an average probability of default for that borrower based on the data it receives from multiple lenders and then maps it to a common rating scale.) Thus, risk managers are able to benchmark their view on the risk of a given company against their peers.

This business is one that obviously benefits from economies of scale, and those economies are now at hand. As of last month, Credit Benchmark was producing ratings on 57,500 firms, 82 percent of which are not large enough to have obtained a credit rating from the ratings agencies. There are now 39 banks contributing data globally, including most of the large U.S. banks. Risk grades are now available on Bloomberg, alongside those from the rating agencies. Think of Credit Benchmark as a crowd-sourced credit rating – albeit with the “crowd” being banks that have independently underwritten credit to the borrower.

This business model was not created with capital regulation in mind; its purpose was simply to allow a bank to determine if it was an outlier relative to peers in its credit view of a given company, and to revisit its assumptions and analysis if so. But the potential ramifications for risk weighting for capital purposes are profound. Those consensus credit ratings, in the hands of regulators as well as bankers, could serve as the goldilocks solution on how to allow for a more risk-sensitive and dynamic risk weighting without concerns about gaming.

Fortunately, while as a legal matter U.S. regulators are prohibited from basing capital requirements on public ratings provided by Moody's/S&P/Fitch, nothing prevents adopting a rule that sets the risk weight for a borrower based on a bank's internal ratings model, provided that the bank's assessment for that borrower was subject to validation through a peer review process – either using Credit Benchmark or some similar service. Bank examiners – who would have no role to play in a standardized approach – would in this case be responsible for ensuring that each bank was not consistently more liberal in its credit view than other banks. And they would have robust data with which to make that assessment. (They would need, though, to resist the temptation to simply increase the risk weight for any asset at a bank that it rates below average, while leaving in place those rated above average; rather, a constructive approach would be to look for systematic biases across loan portfolios.)

There is precedent from the Federal Reserve for using banks' internal ratings to determine capital requirements under the current standardized approach. Last year, the Fed integrated the stress tests with the ongoing capital requirements by replacing the fixed capital conservation buffer with the stress test capital buffer, which is based on the results of the supervisory stress tests. Because the supervisory stress tests rely on banks' own internal ratings as a key input to project losses on corporate loans, the Fed is effectively using bank's own models to determine the risk of each corporate loan. The use of banks' own rating in the stress tests is not much different from allowing the use the output of banks' own internal ratings model to increase the risk-sensitivity of the standardized approach for credit risk.

Overall, leveraging the Credit Benchmarks or some similar service to validate the use of banks' own internal ratings models would appear to offer a notable improvement relative to the one-size-fits-all model used in Basel's Standardized Approach: risk would be assessed more rigorously and granularly; examiners at the banking agencies would be able to assume an important oversight role, guided by robust data; and most importantly capital would be allocated more efficiently among borrowers based on their actual risk.

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