

## **William L Rutledge: Basel II - risk management and financial stability**

Remarks by Mr William L Rutledge, Executive Vice President of the Federal Reserve Bank of New York, at the Central Bank of the Republic of Turkey's International Conference on Financial Stability and Implications of Basel II, Istanbul, 17 May 2005.

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Let me begin by commending the organizers for pulling together such a timely and important conference - Basel II promises to be a watershed event in global financial stability, and giving a full airing of the issues associated with its introduction is particularly important as we draw closer to implementation. I am very pleased to be able to participate in the discussion of those issues - the views I offer will naturally be my own rather than necessarily those of the Federal Reserve.

The Federal Reserve has major roles both as a bank supervisor, and, more broadly as a central bank, for fostering financial stability. Basel II has direct and significant implications for these several roles; it will clearly be an integral part of our supervisory approach going forward, and its emphasis on strong risk management practices also supports our broader financial stability mandate.

My comments will set to the side calibration issues and focus particularly on what I believe are two major ways in which the basic structure and operational requirements of Basel II should enhance the stability of the financial system.

The first is that the new Accord should provide an improved and more comparable way to look at risk-taking across organizations. Accordingly, it will allow market participants, supervisors, and the banks themselves to be more effective in detecting changes in risk levels, and to better assess the appropriateness of particular capital levels supporting such risks.

A second major contribution of Basel II to financial stability is that the preparations for, and the final implementation of the Accord, will result in increased resources applied to improving bank risk management practices. This should result in pricing becoming more reflective of risk, and in better capital allocation across firms, borrowers and industries. Basel II has, without question, already led financial institutions to deepen and accelerate their efforts to improve the evaluation, quantification and disclosure of risk.

These beneficial effects will not just happen, but rather will require major efforts on the part of the private and public sectors. Moreover, there are also possible negative effects of Basel II to evaluate and factor in to our approaches - a topic that I will also touch on briefly.

### **Limitations of Basel I and current supervisory approach**

In thinking about the effects of Basel II, it is useful to step back and look at the current supervisory and regulatory framework - taking into account the Capital Accord currently in effect and how it is used in our supervisory processes.

The original Basel Capital Accord was itself a landmark event, revolutionary in providing a common capital assessment approach, now used by over 100 countries. However, it has obvious limitations that have become more significant over time. It has become less and less reflective of the risks of our largest organizations, and, accordingly, has become less and less integral to our ongoing supervision of them.

Basel I, as we all know, includes such shortcomings as: a) its failure to recognize differing credit quality within the same general asset type; b) its varying the capital charge with the credit exposure's legal form, such as whether it is on or off balance sheet; and c) its simplistic approach to risk transference and credit risk mitigation.

More generally, Basel I was not structured to keep pace with the rapid rate of financial innovation that we have seen in internationally active banks. It clearly has created incentives for capital arbitrage, with banks able to structure transactions with the primary goal of minimizing regulatory requirements without a commensurate reduction in risk. Similarly, it has resulted in distortions in bank activity, by creating a tax on certain activities while understating the risk for others.

These have combined to make the regulatory capital metric less informative to investors, supervisors and counterparties, and have eroded the principle of adequate risk-based capitalization that the Basel Accord was designed to promote.

I should emphasize that the weaknesses of the current regulatory capital framework are much more relevant to the supervision of the largest and most sophisticated banks than they are generally across the industry. For the vast majority of the thousands of U.S. banks, the existing regime largely works. In recognition of this, among other considerations, we expect that in the U.S. most banks will stay on Basel I while the largest and internationally active banks will adopt the advanced Basel II approaches. We are considering some simple adjustments to Basel I to ensure that the framework is up to date and that there is competitive equity with Basel II adopters.

In any event, the lack of risk sensitivity and incentives for arbitrage have made Basel I less relevant in our supervision of the largest banks - it is a benchmark requirement to be met, but not, in practice, a critical discriminating factor as we judge their financial condition.

As supervisors, we have focused increasingly on assessing the rigor and effectiveness of each organization's risk management and control systems. We have looked to understand the risk appetite of each firm, and then assess how well it is able to measure and manage the resulting degree of risk taking.

A key recent part of the supervisory effort has been to encourage the development of banks' internal economic capital models - models that link risk taking to capital and that look to compare risk taking, and the returns on risk, across business lines, regions and products.

But the current stage of development of economic capital modeling - the differences in model construction, assumptions and coverage - limit our ability to make comparisons of the results across institutions. More generally, economic capital models clearly remain in an early evolutionary stage, most particularly regarding operational risk. Their early stage of development can also be seen in the relative paucity of disclosed economic capital estimates by banking firms. Only very recently have we begun to see that some bankers have sufficient confidence in the quality of their economic capital estimates, even of credit risk, to disclose them publicly.

### **Basel II: Effects on comparability**

This brings me to Basel II. The new Accord links risk taking to capital adequacy in a meaningful and consistent way. Its systematic quantification of risk will give market participants new tools for viewing banks' capital positions - providing a strong basis for making comparisons across institutions and over time. While relying to a considerable extent on a firm's internal systems for generating credit risk and operational risk capital charges under the more advanced approaches, the new Accord establishes strong preconditions for firms to meet in using those methodologies. In doing so, it also puts a strong measure of responsibility on the supervisors to ensure that each firm is in fact adhering to those requirements - we cannot simply accept the legitimacy of such an important element of financial condition as capital adequacy without extensive and critical reviews of the processes that generate the numbers.

With these elements in place, comparability should be greatly enhanced. Moreover, unlike Basel I, the new Accord allows for the evolution of bank practice over time by building on the core elements of a bank's internal methodologies - methodologies that are expected to continue to improve, particularly with supervisory and market encouragement.

### **Basel II: Risk management improvements**

The second, and perhaps more significant, benefit I mentioned is the encouragement to improvements in bank risk management practices. Basel II has always had this objective in mind in addition to creating a stronger, more risk sensitive measure of bank capital. We are clearly already seeing this objective being realized.

Basel II builds on risk measurement concepts that have emerged in the industry, although clearly the application of these leading practices varies within and across firms. There has been enormous progress as banks commit to programs that will bring their systems and practices into alignment with the standards articulated in Basel II.

As I have emphasized, a major focus of our supervisory activities has been on ensuring that banks are actively engaged in advancing the linkage of quantified risk-taking to capital, as this is at the heart of both sound banking and Basel II. Let me offer some specific examples, beginning with credit risk and then turning to operational risk.

An example can certainly be seen in the management of retail exposures. Over the last decade, as the geographic dispersion and size of lending portfolios grew at large banks, and amid intense competition, reliance solely on expert judgment in the evaluation of the risks of retail exposures became less and less plausible. Banks developed, and continue to enhance sophisticated scoring systems to better express the likelihood of repayment of individual borrowers, and have grown increasingly sophisticated in their ability to segment exposures by characteristics that provide a fine classification of the risk of a homogenous pool of borrowers.

Basel II allows banks to build off of these practices, bringing regulatory capital requirements into much closer alignment with internal economic capital estimates. Importantly however, this occurs only when banks use those models for risk management purposes - ensuring their continuing effectiveness.

A key element of Basel II is that it establishes rigorous standards for data collection and the systematic use of the information collected. The greatest challenge for the industry, and the greatest potential long-run benefit, involves the collection and categorization of accurate, detailed information on borrower and exposure characteristics and exposure performance. This involves significant investments in technology, and for some firms the revamping of historical underwriting practices. Enhancements to technological infrastructure and MIS, combined with detailed, granular data will, over time, prove a powerful combination allowing firms to better price exposures and manage risk.

The emphasis in the new Accord on improved data standards should not be interpreted solely as a requirement to determine regulatory capital requirements, but rather as a foundation for risk management practices that will strengthen the value of the banking franchise.

In addition to building on the current state of risk management practices, Basel II also promotes continued improvements in those practices. As I emphasized a moment ago, bank supervisors now are heavily focused on critically assessing risk management and control systems - where we find shortcomings, we constantly urge banks to make risk management improvements. Those shortcomings can reflect individual firm failings, in which case, we press the individual firms to bring their approaches up to the evolving best practices of well managed competitors. But the shortcomings can also reflect more systematic problems across the industry - necessitating supervisory efforts to move the industry ahead more broadly to improve its standards. Clearly, both through the micro-judgments for individual firms and through the issuance of broader public guidance to address cross-industry concerns, the supervisory process is critical in ensuring improvements in risk management practices.

Basel II can materially reinforce these efforts by setting strong qualification standards and capital incentives for firms to measure risk more accurately. Historically, the supervisory method for evaluating credit risk at banks in the U.S. focused on the identification of individual commercial loans that were already troubled. Bank supervision added value by assuring counterparties and market participants that banking entities had clean and accurate balance sheets by forcing the timely recognition of losses.

More recently, in response to the development of rating systems, the supervisory effort has shifted to the evaluation of the credit risk management process, and specifically the quality of each bank's internal credit rating system. As supervisors we are no longer solely concerned with whether a bank has properly rated a troubled credit. Rather, we are now focused on the extent to which the bank can properly distinguish between loans across the spectrum of credit quality through its ratings, and whether these ratings are adjusted on a timely basis according to changes in a borrower's performance.

With Basel II, there are requirements for a meaningful differentiation of risk, for credit ratings with integrity, and for a warehouse of data to support the ratings (and requirements to ensure that historical data horizons cover appropriate economic downturn conditions). Moreover, banks will be required to test their rating system's performance, resulting in more accurate ratings and capital assessments. In addition, through Pillar II, banks will be required to benchmark the results of their Pillar I credit assessments through rigorous stress testing.

Basel II also sets rigorous standards for the recognition of credit risk mitigation, ensuring that firms have sound internal procedures for assessing the legal certainty of such mitigation, that they include the effects of netting and collateral and that they factor into their calculations mismatches in maturity between hedging and hedged instruments, as well as other forms of basis risk.

The more recently issued Basel/IOSCO consultative document further raises the bar when it comes to recognizing the effects of double default in credit risk, modeling counterparty credit risk in an integrated manner that recognizes portfolio effects and improving the modeling of market risk, particularly as it relates to the growing exposure to credit-like risks within the trading book.

Basel II already has had a particularly strong impact in improving the way the industry assesses its exposure to operational risk. Before the issuance of the Advanced Measurement Approach, many firms did not consider operational risk to be a discipline in its own right, as they did market and credit risk. Operational risk tended to be managed in a decentralized manner at the level of individual business lines and it was largely based on qualitative considerations. For many firms, operational risk really was focused on managing back-office operations and processes.

With the introduction of the AMA, supervisors introduced a much more comprehensive framework for how firms should go about measuring and managing operational risk. Firms are required to have a much more comprehensive definition of what constitutes operational risk, including not only processing errors, but also business disruptions, legal and compliance risks and fraud, whether from internal or external sources. As with market and credit risk, firms are expected to supplement the management of operational risk at the business line level, with an independent operational risk management function that is responsible for establishing firmwide policies for measuring and managing operational risk. Finally, firms are required to bring together quantitative elements, such as internal and external loss data, with qualitative elements, such as control self assessments and scenarios, to arrive at a reasoned assessment of their exposure to operational risk losses across the firm.

Internal rating systems, credit risk mitigation and operational risk measurement are merely a few of the examples of how Basel II has already spurred improvements in bank risk management and how final implementation will bring further discipline to risk management practice.

Supervisors also will have to make judgments about the effectiveness of the models and associated procedures that banks intend to use for regulatory capital purposes. A key element in making such judgments is the so-called "use test" which requires that banks' regulatory capital models build on the models that they use for internal risk management purposes. This is a necessary condition for supervisors to have confidence in the integrity of banks' regulatory capital models.

Additionally, Pillars II and III give added impetus to comprehensive improvements in bank management practice. Under Pillar II, supervisors will assess the integrity of banks' internal economic capital models - focusing on aspects that are not well-captured in the Pillar I framework, such as the firm's correlation assumptions within and across portfolios and the rigor of its stress testing programs. Finally, under Pillar III, supervisors will seek to ensure that accurate information about risks will be disclosed by banking organizations.

## **Areas of possible concern with Basel II**

### ***Procyclicality***

While I have emphasized the various benefits of Basel II for effective supervision and the preservation of financial stability, there clearly are some possible downsides of the new approach. Concerns have been raised that the adoption of the new Accord will have some destabilizing effects on the international financial system, and emerging market economies in particular. Chief among these is the concern that Basel II will amplify procyclicality as Basel II adopters severely tighten credit standards in response to rising capital requirements in the event of deterioration of credit conditions.

We do expect that minimum capital requirements will rise and fall in response to changes in the risk of a bank's activities, just as the internal economic capital models currently used by banks reflect changing risk exposure by changing capital levels. By itself, this will mean that, even with some changes the Basel Committee made over the years to lessen the effect, some procyclicality still remains.

However, the procyclicality debate should include not only whether capital requirements will rise and fall with economic cycles, but also whether the new requirements provide useful signals to banks, supervisors, and market participants that will lead them to take appropriate action in response to a changing economic environment.

With more gradations in the Basel II framework, banks, supervisors and the marketplace will have an early warning signal when credit quality deteriorates and when it improves. A more risk sensitive

measure should give bank managers accurate signals to adjust lending policies in a more gradual manner early in cycles, dampening severe contractions or expansions in lending.

With its emphasis on planning and risk analysis, the new Accord will require banks (and their supervisors and rating agencies) to think more systematically about the level of capital needed during upturns in order to weather downturns.

### ***Herding behavior***

Another concern that some have raised is that the uniformity imposed by Basel II in calculating capital requirements will result in homogeneous assessments of risk, which in turn will amplify herding behavior in the market place. The new Accord does set requirements for bank risk management by requiring certain types of inputs, and it does set the correlation factors for asset types, but it does not mandate that all banks must have the same assessment of their inputs. Individual banks will still have different methodologies for arriving at the inputs based on their reasoned assessment of risk, and banks' estimates will clearly vary according to their business strategies and the nature of their portfolios.

### ***Concerns that Basel II will be destabilizing for emerging markets***

Another charge leveled at Basel II is that increased capital requirements for lending to emerging market economies will cause banks to reduce credit extensions. Here I think it is particularly important to consider the current reality of banks' decision-making processes. Internationally active banks are not currently making lending decisions primarily on the basis of Basel I capital requirements - rather, they are using their internal risk ratings systems and economic capital models for pricing and lending decisions. These internal models and capital requirements are far more constraining than Basel I requirements.

Therefore, when we try to gauge the impact that Basel II will have on emerging market lending, the pertinent comparison is not with Basel I, but with the internal risk ratings and economic capital systems that internationally active banks now use. As such, we do not expect major changes in international lending as a result of Basel II requirements.

Additionally, Basel II will bring stabilizing benefits to emerging markets that are often overlooked. The sharp distinction in capital charges for longer-term lending versus short-term loans under Basel I has created some distorted incentives, particularly with regard to emerging market lending. The new rules will remove these incentives for short-term lending - a form of lending that can be especially destabilizing to emerging markets during financial stress.

The adoption of Basel II internationally will have the benefit of spreading stronger risk management practices to all countries, including emerging market nations. This is not to say that Basel II is the right answer for all banks or all countries at this time, but rather that all countries should work to adopt various of its underlying principles in assessing banks' risk management systems and in promoting transparency and disclosure. Investors and rating agencies would then have a better understanding of the risk profile of emerging market banks, which could result in a reduction of the risk premium currently applied to some emerging market lending.

### **Conclusion**

In wrapping up, I would emphasize that implementation of Basel II should help supervisors and market participants better detect increases in risk in individual institutions and across the financial system through a more risk sensitive capital measure. Basel II also promises to reinforce and accelerate improvements in bank risk management globally, as well as promote future innovations through its reliance on banks' internal methodologies. How well these improvements unfold will depend critically on the actions of supervisors in integrating the new regulatory capital requirements with their overall supervisory and regulatory approach.

Thank you very much.