A ROAD TO FINANCIAL STABILITY

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ABSTRACT

This article provides a road map to financial stability. The roadmap is created by analyzing successive episodes of financial crisis at various points in time and the regulatory-cum-supervisory responses devised to reduce the chance of future threats to systemic stability. This article provides a glimpse of historical events that led to the establishment of Basel Committee and then critically evaluates committee's efforts to make financial markets more certain and secure. This article also highlights the efforts of supervisory authorities in creating an effective regulatory framework through the Basel Capital accords. A critique of the Basel accords is sketched showing how Basel I and Basel II did not help contain successive episodes of financial crisis. This paper also draws upon Basel III regulations currently under deliberation and highlights vulnerable areas that may continue to threaten systemic stability even after the implementation of Basel III.

JEL: G01, G15, G18, G28

KEYWORDS: Financial Crises, International Financial Markets, Government Policy and Regulation, Regulation of International financial Institutions

INTRODUCTION

The regulation of financial markets is a continuing task. As financial markets expand, new and innovative products continue to develop; therefore, it is always difficult if not impossible to apply a "one size fits all" formula in regulation and supervision of international financial markets and institutions. The history of financial crisis is as old as the market itself (C. Kindleberger, 1989). It depicts common patterns of behavior in aggravating crisis, including the lack of coordination between host and home country supervisors, the tendency of supervisory authorities to be more reactionary to the eruption of crisis rather than proactive in their approaches to predict issues and hence take appropriate measures in advance, and last but not least, ineffective enforcement mechanisms to secure implementation of financial regulations across the board between all sovereign state actors in an efficient way. The Basel Committee on Banking Supervision, hosted by the Bank for International Settlements (BIS), was constituted to fill in these gaps by G-10 Central Bank Governors for setting standards for international financial markets (G10 Governors, Communiqué, September 1974).

Over the past three decades, according to a range of reviews, there have been at least 42 systemic banking crises in 37 countries and there were at least nine major financial crises during the 1990s and 2000s in emerging market economies (Kawai 2010; Laeven & Fabian 2002). Such banking crises are becoming more frequent in the post-Bretton Woods period and are occurring on average after every 20 to 25 years in both industrial and emerging market countries, with the annual probability of crisis about 4-5%, according to a recent analysis (Stefan Walter, Secretary General, Basel Committee on Banking Supervision, 2010). It is safe to make an assumption from the frequency of repetition of crisis episodes that if the financial regulators remain unable to address the basic systemic problems swiftly and effectively, the world may continue to be traumatized by shocks from recurring episodes of financial crises.

Currently, there are many developments taking place especially as the Basel III regulations have been made public in November 2010 and are being processed for implementation and adoption. Policy makers all over the world are searching for the best avenues that can ensure stabilization while simultaneously not overburdening financial markets with unnecessary increased regulations and implementation costs. On one hand, the goal is to prevent any failure of the international financial system while on the other, to support smoother economic and financial development in future without fear of systemic threats. This paper is an attempt, precisely at the time when all these developments are occurring, to highlight certain areas of potential risks that have historically contributed to weaken the international financial architecture. This analysis has been done with specific instances from history, beginning with the example of how the collapse of Bankhaus Herstatt redefined the concept of interconnectedness of international markets.

The organization of the paper commences following a historical journey over the regulatory developments taking place during the last century. It discusses how Basel I and then Basel II attempted to make this world a safer place through better regulations. We will see through this paper to what an extent the supervisory authorities through the Basel Capital Accords remained successful in making financial markets more predictable and controlled while at the same time, we will identify the issues that hindered effectiveness of these controlling mechanisms. Finally, this paper concludes by making some recommendations towards a safer way forward.

LITERATURE REVIEW

Under the laissez faire economy, it is generally believed that the financial regulations are largely based on the theory of rational and self-correcting market principles (Larson 2009). Similarly, at the heart of the libertarian dogma is: "*the belief that markets know best and that those who compete well will prosper, while those who do not will fai*l."(Kaufman 2009). As we have seen, regulations over the past few decades have rested on the notion that markets are essentially rational and highly efficient at allocating resources and that markets are generally self-policing and self-correcting (Schooner & Taylor, 2010). However, from the repetitive episodes of financial crisis in Latin America, in East Asia, and most recently, in 2008-2010, we have witnessed failure of this theory that markets offer symmetric information and hence always act rationally (Blundall 2008; Ackerlof & Schiller 2009). Thus, it became evident that unregulated or non-regulated free markets can pose devastating threats to the smooth functioning of financial markets, and so emphasizing on the need to have regulated regimes (Paletta & Scannell 2010).

Schooner and Taylor (2010), while talking of regulatory regimes, criticized Basel I which remains by a large margin the most comprehensive set of regulatory policies so far. They note, first, that Basel I was unable to differentiate credit risks under the formula for risk-weighting categories or buckets because risk was evaluated on loan-by-loan basis rather than portfolio level. Second, the OECD/non-OECD distinction was arbitrary and politically driven. Finally, they identify the failure to recognize that risk through diversification as one of the major criticisms of Basel I. It is often the carried forward mistakes and lapses in required responses that serve as the breeding grounds for the next crisis. Importantly, for the 2008 global financial crisis, many of the underlying factors arose from responses to previous crises, dating back to the reform of the US financial regulatory system during the Great Depression. However, significant effects arose primarily from reactions to the financial disruptions that took place in the 1980s and 1990s (Arner 2009). This historical evidence reinforces the review though the international regulatory approaches once again, at a minimum to address issues underlying the most recent crisis while at the same time endeavoring to avoid laying the foundations for the next crisis. While the former is certainly possible, unfortunately, the latter is probably not. In relation to Basel II, due to pro-cyclicality trends, Basel II underestimates the risks in good times while overestimating them for bad times (Blundell 2008). Hence, the system of banking regulation requires a thorough overhaul (Hellwig 2010). The recommendations given in the last section highlights these areas where improvements and revisions are necessary.

HISTORICAL EVIDENCE

While initially restricted after World War II, since the collapse of the Bretton Woods international monetary system in the early 1970s, international financial markets witnessed unprecedented growth and expansion. With the establishment of cross border branches and subsidiaries of financial institutions, the international financial markets became more interconnected and dependent on each other. Following the collapse of the fixed exchange rate system and the rapid liberalization of capital flows in the West, international financial markets were exposed to new uncertainties arising out of hybrid transactions and new capital and interest rate risks which emanated from the emergence of floating exchange rates and increases in cross-border capital flows. In this initial period of rapid liberalization, excessive borrowing and lending fuelled by massive amounts of petrodollars coupled with interest rate hikes in US led to the realization of systemic risk as a factor which can cause systemic crisis. The situation was aggravated further with the collapse of a number of big financial institutions such as Franklin National Bank in the US and Bankhaus Herstatt in Germany. Therefore, the Basel recommendations and Capital accords came as a response from the regulators of the world to cater for future incidents.

However, the Basel I accord and recommendations did not prevent the outbreak of the Asian financial crisis in 1997-1998, which in fact in many ways laid the foundations for the unprecedented 2008-2010 global financial crisis. In response to the Asian financial crisis, the regulatory bodies came up with amended capital accords by incorporating market risk into the risk management criteria and Basel II was offered as a solution to any foreseeable systemic crisis in 2006, for banks. At that time, the supervisory authorities were fully aware of the fact that the cross border exposures and inter dependency of financial institutions have given birth to a new banking model "universal banking" where, due to extreme connectedness and interdependency of banking markets and operations, runs on one bank in one part of the world could cause the collapse of other financial institutions in the rest of the globe.

The Basel Committee began its journey with the issuance of its initial recommendations, commonly called the First Concordat, in 1975. The first concordat was important in the sense that it was first time in the history of international financial regulation that the principle of joint responsibility between home and host supervisors was established for the supervision of foreign banking establishments. It was stated that the supervision of liquidity shall be the responsibility of host supervisors and the supervision of solvency of foreign branches shall be the responsibility of home supervisors and an emphasis was placed on information sharing and cooperation between home and host authorities. Following the collapse of Banco Ambrosiano in 1982 and keeping in view the problems identified in regulation of holding companies and mixed activity groups, the Basle issued the revised concordat in 1983 (Walker, Kluwer Law, 2001) wherein, in addition to earlier principles, it was stated that the authorities should adopt the principle of consolidated supervision and the health of financial institutions should be judged on both stand-alone and consolidated basis. The revised concordat further made an important recommendation that the home and host authorities should monitor the effectiveness of supervision conducted by the other and should step in to extend supervision or to take necessary action if the supervision is not properly done by the other. The 1983 revised concordat was subsequently examined by the Basel Committee to issue an information supplement (Walker, International Banking Regulation, 2001).

The year 1988 was an important one in the regulation and supervision of international financial markets. The Basel Committee was successful in creating an agreement among supervisory authorities on the application of minimum capital rules, commonly called the Basel Capital Accord or Basel I. The Basel I fixed a minimum capital ratio of 8% to total risk adjusted assets and provided a tiered definition of the capital and divided the assets of banks into different risk buckets on the basis of underlying risks involved (Alexander & Dhumale 2006). The factors behind its universal acceptance and application were its relative simplicity and minimum costs. However, subsequently, it became subject of increased criticism as the focus of these rules was only counterparty default or credit risk and the market and operational risk

were not given any weightage in calculation of minimum capital ratios for any bank (Walker, International Banking Regulation, 2001). Another point that worked to its disadvantage was its failure to create a level playing field for all international financial institutions through its classification system as it assigned a zero percent risk figure to the OECD Governments and central bank credits; while a 100 percent risk figure for all other claims irrespective of the credit standing of counter party concerned (Walker, "So close but so far," 1999).

However the Basel Committee did not stop regulatory attempts here and continued its efforts to fill in the gaps in the regulation and supervision of financial markets. It again made significant achievements in the form of establishment of minimum standards in 1992 and the core principles for effective banking supervision in 1997. Though a market risk charge was also included in Basel I through the Market Risk Amendment in 1996 (following the failure of Barings), due to its crude classification system and failure to adjust to subsequent changes in the structure and operation of financial markets, the single measurement mechanism became outdated and need was felt to overhaul the whole system. Therefore, the Basel Committee started working to devise a more risk sensitive and adaptable-to-change mechanism. After extensive consultations, a new capital framework, commonly called Basel II, was introduced in 2004. The purpose of this framework was to improve the safety and soundness of financial system through a three pillar structure; (i) capital adequacy, (ii) supervisory review, and (iii) market discipline through necessary disclosures (Walker, International Banking Regulation, 2001).

This new system under Basel II was considered to be highly risk sensitive as more risk buckets were included in the calculation of minimum capital requirements. Furthermore, new operational risk charge was introduced to cater for the losses caused due to a failure of internal control systems, processes and staff corruptions. This effort to strengthen internal controls and systems was complemented by new supervisory review mechanism and market disclosure requirements. On the whole, the new system was kept flexible, innovative and adaptable to changing banking structures, operations and products. The Basel Committee offered banks a choice between two broad methodologies for calculating their capital requirements for credit risk which were: (1) the Standardized Approach, to be used to measure credit risk in a standardized manner**,** supported by external credit assessments; and (2) the Internal Ratings-based Approach, which subject to the explicit approval of the bank's supervisors, would allow banks to use their internal rating systems for credit risk (Valdez & Molyneux 2010).

Unfortunately, this new framework failed to prevent the next crisis. Importantly, the Basel Committee had limited participation with no formal status (Walker, Law, Policy and Practice, 2001). The structure was weak in the sense that it remained ineffective in devising binding international standards in the regulations of financial markets and banks. While surprisingly on the other front, it worked remarkably well in developing consensus on application of minimum standards in the supervision of financial markets. Though the standards were formulated, harmonious and across the board enforcement remained unrealized. This gap in implementation and discretion in adoption of regulatory principles contributed to the outbreak of the most recent crisis, allowing a global interbank run and contagious losses of confidence. Thus Basel II, which was supposed to be a bulwark, was in fact much weaker than believed.

The financial system is a system of promises. A basic problem with the Basel Capital Accords which has not been addressed even in the proposed Basel III, lies in its failure to establish a regulatory system which should treat the same promises in the financial system in the same way regardless of wherever they are passed or shifted (Blundell-Wignall & Atkinson, OECD Journal 2010). This different treatment of similar promises makes it very easy for banks to transfer financial promises to a less regulated sector and enable them to hold less capital against actual risks.

Pro-cyclicality is also one of the factors that have hampered the effectiveness of the Basel II framework. This, however, is not a new issue, as many analysts during the discussions of Basel II voiced concerns

about its procyclical potential (Taylor, Ashley, Goodhart, 2006). Though a certain degree of procyclicality may be inevitable and even appropriate (Saurine, June 2008), we have witnessed during the recent crisis that this procyclical tendency exacerbated the crisis. The corrective measures taken in the light of concerns of analysts could have controlled at least part of the damage caused by procyclical nature of the Basel framework.

RECOMMENDATIONS

Bank runs of whatever form are always serious events and require immediate and effective control measures because they have the potential to spread through contagion and can lead to systemic risks, as the events following Lehman Brothers collapse witnessed. A timely support might have avoided the loss of confidence that spread due to the perception of authorities (that Lehman would not be sporadic for systemic crisis, so let it be allowed to fail). There it depicted not only Basel II failure but a complete loss of faith on all the existing regulatory or supervisory bodies including the G-7's comprehensive statement (Oct 2008) as endorsed by full membership of IMF, World Bank and then Financial Stability Forum (FSF). It was followed by the G-20 Declaration to support an open global economy by laying the foundations for reforms in Action Plan to ensure such a crisis never happens again (November 2008).

The year 2009 kept policy makers occupied in redesigning and modifying the financial supervisory-cum-regulatory structures to ensure transparency, accountability and across the board adoption and enforcement. In this context, the Basel Committee issued Basel III in September 2010, which enhances the minimum capital (common equity) requirements from 2% to 4.5%, along with a conservation buffer of 2.5%. These capital enhancements are supplemented by a non-risk based leverage ratio. To address procyclical concerns, Basel III proposes to introduce new measures which include long term calibration of the probability of default in the modeling of risk, forward looking provisioning and holding buffers of capital above the regulatory minimum (Blundell-Wignall & Atkinson, OECD Journal 2010). These are the additional measures proposed and being discussed and debated over for adoption to help address issues arising in the global financial crisis and to prevent future global systemic financial crises. Bank of England Governor Mervyn King suggested to split up banks and separate riskier activities from more stable businesses such as taking deposits (utility banking). He criticized the implicit support of taxpayers to these financial giants and said that: "the financial sector takes on risk with the support of the tax-payer's money and that reflects not genuine risk-bearing" (King 2010). However, Nout Wellink, Chairman of the Basel Committee feels the proposed measures would serve the right requirements, "the combination of much stronger definition of capital, higher minimum capital requirements and the introduction of new capital buffers will ensure that the banks are better able to withstand periods of economic and financial stress, therefore supporting economic growth" (Wellink 2010).

Basel III has recently introduced "bail-in" measures; (this falls in line with the ideas of Mervyn King when he criticizes reliance upon the support of taxpayers) which would force creditors to share the cost of propping up large banks before taxpayers have to become involved. (BIS Press Release Oct 2010) This idea is quite controversial because the US FDIC chairwoman, Sheila Bair said that the idea of contingent capital (Cocos) is a kind of convertible debt, it is intriguing and this option would not always resolve the underlying crises of confidence in the institutions (Eaglesham 2010). Against the backdrop of the Euro zone debt crisis, it may not be a good idea to presume that West' debt is risk-free and there lies a fatal flaw under the Basel III that top-rated government bonds, (such as those of the US and the UK), despite having long been among the few asset classes against which financial groups need not hold capital because they are deemed certainly not to default (Duyn Macenzie). A deeper analysis and comparison reflects that the Dodd-Frank legislation, by contrast, is better to address systemic wide issues than the "bail-in" measures. It incorporates the idea of "living wills" that would make it easier to wind up such falling institutions in case of failure (Turner Review 2009).

Finally, Lord Turner of the UK Financial Services Authority (FSA), advocates the use of new capital and liquidity requirements rather than a "structured" solution – such as the clear institutional separation between classic bank services to the real economy ("narrow banking" or "utility banking") and risky propriety trading activities ("investment banking" or "casino banking"). John Gapper endorses the point in Where there's a Will there's a Way. However, Mervin King, Governor of the Bank of England said that "Living will' is a misnomer, since the term means a plan drawn up by a bank for how it can be broken up if it becomes insolvent. It would be simpler and more accurate to use the term 'will'.

CONCLUDING COMMENTS

We have seen through this paper that though the efforts have been made by world supervisory authorities to devise a strategy to avoid financial shocks but the lack of coordination, slow response time and the failure to ensure across the board implementation shed a fatal blow to the success of Basel regulatory-cum-supervisory regime. The goal of this paper has been to see that whether the efforts of world supervisory authorities through Basel are actually leading us towards a point where we can expect stability and certainty in financial markets. Also, most importantly, this paper was not limited to the task of identification of gaps but to suggest the measures that can help remove those gaps in supervision and regulation of financial markets. This paper has highlighted amongst others, the efforts of Basel committee for a dynamic and stable international regulatory regime, the strengths and weaknesses of regulations that came from time to time, and identified the areas/factors which reduced the effectiveness of risk measures during boom period and finally, the resulting controlling measures to tackle systemic risks in recent crisis. This has been done by analyzing the workings of the Basel since its inception to date by taking instances from crisis and in doing this analysis, a keen study of Basel recommendations and accords has been conducted. As Basel III is still being discussed for adoption and implementation, so this article cannot fully appreciate how Basel III would be successful in making the financial world a safer and predictable place. Future researchers may be able to give a critical account of how far Basel III has made a difference.

The Financial Stability Board (FSB, successor to the FSF) and the Basel Committee provide supervisory forums for regular cooperation to design acceptable and enforceable universal risk-based management mechanism. However, there is a need to elevate the status of this forum to devise not only acceptable but truly enforceable universal mechanism. In view of the recent increase in globalization, regulators should co-operate with each other and each of them may base on the lowest-common denominator approach in resolving systemic wide issues for a sustained and predictable behavior of globally systemically significant financial institutions. This belief that higher level of capital provides a buffer against risks and makes financial markets more resilient may be correct but the FSB and Basel Committee need to take care of the fact while suggesting any increase in capital requirements that it does not unduly hinder growth and innovation. In addition to focusing on much needed capital requirements, an equally pressing need is to ensure that other two important pillars of Basel II, i.e. supervisory review and market disclosure, are given due weightage and are properly implemented so that three pillar structure can bring much needed stability in the financial markets. Capital adequacy, unless truly complemented by supervisory review and adequate market disclosures will not be able to establish any effective regulatory-cum-supervisory regime, capable to detect market distortions, to ensure compliance and identify problem areas. Market discipline is an essential step towards strong and resilient financial markets and unless and until comprehensive regulatory structures prescribing market discipline, an effective corporate governance code, and an effective mechanism to protect financial institutions in the event of any failure are not materialized and adopted by all the influential market players, the road to financial stability would continue to prove increasingly rough during the years to come. Thus, establishing a financial code for all the major actors would ensure progress and smoother running of today's highly advanced and complex financial markets. Finally, Nout Wellink, Chairman of the Basel Committee, speaking at the 16th International Conference of Banking Supervisors said, "While painful and costly, the crisis has

nonetheless presented an opportunity to put in place longer term reforms that are needed to make banks and the financial system more resilient to future periods of stress" (Wellink, 2010).

REFERENCES

Akerlof, G. & R. Shiller (2009). Animal spirits: "How human psychology drives the economy, and why it matters for global capitalism", Princeton, Princeton University Press.

Alexander, K., R. Dhumale et al. (2006), Global Governance of Financial System: "The International Regulation of Systemic Risk, p.143

Arner, D. (2007), Financial Stability, Economic Growth and the Role of Law, Cambridge University Press

Arner, D. (2009), "The Global Credit Crisis of 2008: Causes and Consequences", The International Lawyer, Vol. 43, No.1, Spring

Ashraf, U. (2008), LLM dissertation titled, "Operational Risk and Basle II", Queen Mary College, University of London

BIS (2009), History of the Basel Committee and its Membership, August, *available at* http://www.bis.org/bcbs/history.pdf (last visited 7 December 2010) at p.1

BIS, Press Release (2010): Group of Governors and Heads of Supervision Announces Higher Global Minimum Capital Standards, September 12,,*available at* http://www.bis.org/press/p100912.htm (last visited December 10, 2010) at 2

Basel Committee (1975), "Report on Supervision of Banks' Foreign Establishments", September

Basel Committee (1983), "Principles for Supervision of Banks' Foreign Establishments", May

Basel Committee (1978), "Consolidation of Banks' Balance Sheets: "Aggregation of Risk Baring Assets as a Method of Supervisory Bank Solvency", October

Basel Committee (1988), "International Convergence of Capital Measurement and Capital Standards", July

Basel Committee (1990), "Information Flows between Banking Supervisory Authorities", April

Basel Committee (1992), "Minimum Standards for the Supervision of International Banking Groups and their Cross Border Establishments"

Basel Committee (1996), "Amendments to Capital Accord to Incorporate Market Risk, January

Basel Committee (1997), "Core Principles for Effective Banking Supervision", September

Basel Committee (2001), "The New Capital Accord", January,, "New Accord"

Basel Committee (2001), "Overview of New Basle Capital Accord" (Overview Document)

Blundell-Wignall, A. & P. Atkinson (year?), "The Sub-Prime Crisis: Casual distortions and regulatory reforms", in P. Bloxham & C. Kent (eds), lessons from Financial Turmoil of 2007 & 2008, Reserve Bank of Australia.

Blundell-Wignall, A. & P. Atkinson (2010), Thinking Beyond Basel III: "Necessary Solutions for Capital and Liquidity", Issue 1, OECD Journal

Eaglesham, J. (2010), FDIC Urges Bank Action on Living Wills, Financial Times, September, p.18
Gapper, J. (2009), *Where there's a Will there's a Way*, Financial Times, September 24, at 11
G-10 Central Bank Governors (1974), "Communiqué" September

Hellwig, M. (2010), "Capital Regulations after the Crisis: Business as Usual?", Max plank Society, Bonn
Kaufman, H. (2009), How Libertarian Dogma Led the Fed Astray, Financial Times, April 28, p.11

Kawai, M. (2010), *Reform of the International Financial Architecture: An Asian Perspective*, 5: 1 The Singapore Economic Review 207, p.207

Kindleberger, C. (1989), "Manias, Panics and Crashes": "A History of Financial Crises"

King, M. (2010), Keynote Address at Banking: From Bagehot to Basel, and Back Again October Larsen, P. (2009), A Lot to be Straightened Out, Financial Times, March 31, p.9

Laeven, L. & F. Valencia (2002), International Monetary Fund, Washington, D.C., Systemic Banking Crises: A New Database (IMF Working Paper WP/08/224), p.3

Masters, B., *Bank 'Bail-ins' are Best Option, says Regulaor*, Financial Times, October 5, 2010

Paletta, D. & K. Scannell (2010), The Financial Crisis: Some Questions for Those Fixing the Mess, The Wall Street Journal, March 11, p.20

Saurina, J. (2008), Point of View: "Banking on Right Path", Finance and Development, June

Schooner, H. & M. Taylor (2010), Global Bank Regulations: "Principles and Policies", 142-143

Taylor, A. & C. Goodhart (2006), Procyclicality and Volatility in the Financial System: "The Implementation of Basel III and IAS 39," in S. Gerlach & P. Gruenwald (eds), Procyclicality of Financial Systems in Asia, Houndsmill, Basingstoke, Pelgrave Macmillan

Turner, A. (2009),The Turner Review: "A Regulatory Response to the Global Banking Crisis",March, *available at* http://www.fsa.gov.uk/pubs/other/turner_review.pdf (last visited 10 April 2009) at 93-94,

Valdez, S. & P. Molyneux (2010), "An Introduction to Global Financial Markets"' 167 , p.40

Walker, G. (1999), "So Close but So Far", FRR, May
Walker, G. (2001), "International Banking Regulation"- "Law, Policy and Practice" Kluwer Law, Chapter 1

Walter, S. (2010), Speech: "Basel III and Financial Stability", 5th Biennial Conference on Risk Management and Supervision, November
Wellink, N. (2010), Remarks: "A New Regulatory Landscape", 16th International Conference of Banking Supervisors, Singapore, September

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