The Reform of 'Too-Big-To-Fail' Bank: A New Regulatory Model for the Institutional Separation of 'Casino' from 'Utility' Banking

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Emilios Avgouleas*

**THE REFORM OF ‘TOO-BIG-TO-FAIL’ BANK
A NEW REGULATORY MODEL FOR THE INSTITUTIONAL
SEPARATION OF ‘CASINO’ FROM ‘UTILITY’ BANKING**

ABSTRACT

President Obama’s proposed legislation for the separation of ‘casino’ from ‘utility’ banking has re-ignited the relevant debate. Behind the Obama proposals is the belief that the ‘too-big-to-fail’ banks were among the principal causes of the global financial catastrophe. Although most of Europe did not have any restrictions regarding the kind of business that deposit-taking banks could undertake, the mega-bank business model is mostly a creature of the 1990s. It emerged as a result of a merger wave between investment firms and banks, which became possible because of the deregulation of the western financial services industry. Those mergers were the answer of the financial services industry to the challenges posed by globalisation and financial innovation. Today, the emergence of mega-banks is a development that is much lamented. ‘Too-big-to-fail’ banks fostered excessive risk-taking, as they enjoyed an implicit government guarantee for their aggressive speculation in global capital markets. Yet during the 2007-2009 crisis ‘too-big-to-fail’ banks just became considerably bigger. This has created the ‘biggest moral hazard of our times’. Moreover, the fiscal burden of bank rescues and the fact that ‘too big to fail’ adulterates free market principles and Schumpeterian capitalism make the search for a solution ever more pressing. This paper argues that, if the correct typology is given to various banking activities, separation is possible and may not be more expensive than suggestions for multiple layers of capital regulations. As such the paper presents for discussion a model that provides for three types of banking institutions. The successful implementation of this or of any other similar model requires strong international consensus. The lack of such consensus is the biggest shortcoming of the Obama plan.

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1. INTRODUCTION

To paraphrase a great wartime leader, never in the field of financial endeavour has so much money been owed by so few to so many. And, one might add, so far with little real reform.¹

1.1 Overview

The global financial crisis has led the world to the throes of the biggest economic downturn since the ‘Great Depression’.² A number of ‘too-big-to-fail’ institutions, also called Systemically Important Financial Institutions (SIFIs), have by all accounts been at the heart of the crisis.³ As ‘too-big-to-fail’ is defined here every financial institution (including investment firms and insurance companies) the failure of which would mean serious disruption to the function of the system distorting its ability to facilitate orderly payments and settle transactions between institutions and institutions and consumers within the domestic or the international markets. Such a development may also trigger a crisis of confidence in the financial system leading to a chain of failures (systemic failure).⁴ Thus, SIFIs are normally

1 Speech by Mervyn King (Governor of the Bank of England) to Scottish Business Associations, 20 October 2009, 3. Available at <http://www.bankofengland.co.uk/publications/speeches/2009/speech406.pdf>

2 Larry Summers, the Chief Economic Advisor to President Obama has postulated that in the US alone: ‘Over the past two years, the American people have experienced the worst financial and economic crisis since the Great Depression. From the time the recession began in December 2007, 7.6 million Americans have lost their jobs. During the last few months of 2008 alone, over \$5 trillion of household wealth was destroyed.’ Lawrence H. Summers, ‘Why American Families and Businesses Need Financial Reform’, The White House Blog, October 15, 2009, available at <http://www.whitehouse.gov/blog/Why-American-Families-and-Businesses-Need-Financial-Reform/>

³ UN Report, ; UNCTAD Report, ‘The Global Economic Crisis: Systemic Failures and Multilateral Remedies’ (March 2009) available at: <http://www.unctad.org/Templates/webflyer.asp?docid=11200&intItemID=2068>
Also Simon Johnson, ‘Too-big-to-fail, Politically’ in Johnson’s blogspot: www.baselinescenario.com, 18 June 2009, available at <http://baselinescenario.com/2009/06/18/too-big-to-fail-politically/> Johnson, an MIT professor and former IMF chief economist, sees regulatory failure leading to the crisis as inextricably interwoven with the fact that regulators allowed banks to become ‘too-big-to-fail’.

⁴ Reflecting the definition of systemically important institutions offered in the Report of the Group of Thirty, but may not be in full accord with the definition of systemically important institutions adopted elsewhere. The

institutions of such size and importance to the financial system domestically and internationally – measured either by the possible number of outstanding economic relationships with other institutions or by the critical (for the running of the economy and of the financial system) infrastructure services they offer - that their failure to settle their obligations would trigger a system wide crisis.⁵ The most important of the ‘too-big-to-fail’ institutions are so-called mega-banks, namely, banks of a very large size that combine within the same institutional roof commercial and investment banking activities.

The orderly operation of the financial system in ensuring economic growth and the proper function of the economy through the channelling of resources and facilitation of payments and settlements of transactions is of vital importance to any modern economy. It follows that any serious disruption in the orderly operation of the financial system would also mean serious disruption in the daily lives of millions and millions of businesses, individuals, and families. As a result, these ‘too-big-to-fail’ institutions operate under an implicit government undertaking that, although a private business, their continuous existence as a

Report of the Group of Thirty suggests that financial institutions must be judged as systemically important by reference to: (a) their size, i.e., their balance sheet (combining on and off balance sheet items) compared to a national economy’s GDP, (b) the scale of leverage being employed, (c) scale of interconnectedness and especially the degree that one firm’s failure will have immediate and knock on effects on a large number of other significant institutions, and (d) the systemic significance of infrastructure services. See Group 30, ‘Financial Reform: A Framework for Financial Stability’, 15 January 2009, 19. Available at <http://www.group30.org/pubs/reformreport.pdf>

⁵ The FSA offers a broader test in determining when an institution is systemically important: ‘i) **systemic by size**. This can be a function of the firm’s absolute size or in relation to a specific financial market or product in which a firm is particularly dominant . . . ii) **systemic by inter-connectedness**. Links and inter-connections can include, inter alia, inter-bank lending, cross holdings of bank capital instruments, membership of payment systems, and being a significant counterparty in a crucial market. The channels through which such problems manifest themselves include: • interbank exposures. The domino effect where the collapse of one firm leads to major losses at others, and then in turn leads to their collapse. This can then trigger a chain reaction; the confidence channel. The collapse of a systemically important firm leads to a crisis of confidence in financial markets. iii) **systemic as a herd**. The market can perceive a group of firms as part of a common group (for example, because they have a similar business model, such as building societies in the UK and the savings and loans banks in the US), or common exposures to the same sector or type of instrument.’ Financial Services Authority (FSA), ‘A Regulatory Response to the Global Banking Crisis: Systemically Important Banks and Assessing the Cumulative Impact’, Discussion Paper 09/4, October 2009, 13-14.

going concern is guaranteed by the taxpayer whatever the circumstances of the institution's failure. This continuous undertaking is normally enjoyed by big banks as well as other SIFIs. However, as it is difficult to define *ex ante* which institutions are SIFIs,⁶ this article focuses on mega-banks which also are at the centre of the problem and the target of President Obama's recent proposals.⁷

Mega-banks started emerging in the early 1990s as a result of three factors: financial innovation, industry deregulation, and financial globalization which led to a wave of mergers and acquisitions pushing the international financial services industry to a very high level of conglomeration. Disregarding the potential of creating colossal conflicts of interest, regulators allowed mega-banks to emerge because of industry's insistence that they were necessary under new market conditions of global market integration and financial innovation. The supporters of conglomeration submitted that financial conglomerates created better returns for shareholders, due to economies of scale and organisational efficiencies and strengthened the income base of relevant institutions, which became more diverse. Therefore, according to this view, consolidation strengthened the stability of financial institutions and thus the stability of the financial system.

The global financial crisis proved that most of those beliefs were pure fiction.⁸ Instead of becoming more stable, mega-banks fostered an organizational culture of short-termism and

⁶ 'Clearly, the extent to which other firms are to be considered systemically important will depend on the wider market conditions prevailing at the time the firm requires resolution. This makes it difficult, and in some cases impossible, to determine ahead of time whether particular firms will be systemic (this is particularly true for 'systemic as a herd' firms).' FSA Discussion Paper, *ibid.*, 17. See also Richard Herring, 'Wind-Down Plans as an Alternative to Bailouts: The Cross-Border Challenges', mimeo, December 2009, 2 and note 4.

⁷ Tom Braithwaite and Francesco Guerrera, 'Obama Hammers Wall Street Banks', *Financial Times*, 22 January 2010, available at <http://www.ft.com/cms/s/0/44f593ee-06a7-11df-b426-00144feabdc0.html>.

⁸ See Arthur E. Wilmarth, 'The Dark Side of Universal Banking: Financial Conglomerates and the Origins of the Subprime Financial Crisis' 41 *Connecticut Law Review* 963 (2009).

aggressive speculation in order to boost trader and bank executive compensation as well as returns to their shareholders. They resorted to massive use of financial innovation to take speculative gambles in all asset markets and rode in full the wave of excessive liquidity that swept global markets from the late 1990s until 2007, leveraging their balance sheet to unsustainable levels. In the process, they loaded their balance sheets with a large number of impossible to value high-risk assets, especially the OTC traded Credit Default Obligations (CDOs) and Credit Default Swaps (CDSs), piling up colossal amounts of practically undiversifiable risk. At the same time, they generated unreasonable compensation packages for traders and bank executives and reasonably high returns to their shareholders. Namely, they became a ticking time bomb for the stability of the global financial system.

Yet they were not the only institutions that behaved in this manner. The institutions that ultimately failed were not mega-banks but relatively specialized and undiversified institutions such as Lehman Brothers, Bear Stearns, both non-deposit taking institutions, and Northern Rock, a former Building Society. So it is worth considering why so much criticism is directed at mega-banks.

Arguably, apart from the inequity created by the fact that there are hardly any other private businesses that enjoy such a protection by the public purse, there are other very serious economic implications to consider. First, ‘too-big-to-fail’ banks are often ‘too big’ to bail out and the cost to the taxpayer may well be unsustainable. Second, they constitute a serious adulteration of free market economy principles, especially of free competition, and obliterate the Schumpeterian process of ‘creative destruction’. Third, the existence of the government guarantee ameliorates the disciplining power of the market over the big banks’ management and shareholders, allowing them to take excessive risks without having to face the consequences of their decisions. Namely, mega-banks fostered excessive risk-taking

behaviour that was made possible only because of their ability to free-ride over the insured part of their liabilities (deposits) and of the implicit government guarantee of their continuous existence as a going concern.⁹ Furthermore, there are several important inefficiencies associated with mega-banks, since they are: (a) expensive and hard to manage and regulate and (b) prone to herding, which, because of their size, leads to homogeneous behaviour depriving the market from its natural stabilizers.

Given the above observations an impartial observer would be entitled to think that the global financial crisis should have spelt the death by regulation of the mega-bank business model. Paradoxically the opposite was true until recently. In the aftermath of the global financial crisis the number of mega-banks increased following a spate of industry consolidation. This means that the problem with the ‘too-big-to-fail’ institution has become more severe and pressing. Until January 2010 the majority view was that a break-up of mega-banks would be impractical in today’s highly integrated financial markets and very expensive. The initial proposals of the US Treasury for the regulation of the financial services industry, although they suggested extending regulatory oversight to financial holding companies and institutions that did not fall before under the regulatory umbrella of the Federal Reserve, they did not discuss at all limits on bank activities or suggest a break up of mega-banks.¹⁰ Similarly, in the EU, where regulatory reform legislation has so far touched on issues of systemic risk and individual institution supervision,¹¹ regulation of Credit Rating

⁹ Markus Brunnermeier, Andrew Crocket, Charles Goodhart, Avinash D. Persaud, and Hyun Shin, *The Fundamental Principles of Financial Regulation*, Geneva Reports on the World Economy 11, January 2009; [Hereinafter the Goodhart Report]. Available at: <http://www.voxeu.org/reports/Geneva11.pdf>
FSA, ‘The Turner Review: A Regulatory Response to the Global Banking Crisis’, March 2009, available at: http://www.fsa.gov.uk/pubs/other/turner_review.pdf

¹⁰ US Treasury Department, ‘Financial Regulatory Reform, A New Foundation: Rebuilding Financial Supervision and Regulation’, 18 June 2009.

Agencies¹² and OTC derivatives,¹³ no consideration has been given to reform of the mega-bank model as a solution to the problem of the ‘too big to fail’ institution.

1.2 The State of Reform

The hostile approach to separation of ‘utility banking’ from ‘casino’ banking’ has now much changed. Echoing the spirit (but not the letter of the Glass-Steagall Act), and ‘in response to banks’ irresponsible behaviour, President Obama announced on 21 January 2010 that the US will take measures to limit the overall size of banks, seeking to limit consolidation in the financial sector, by placing curbs on the market share of liabilities at the largest firms.¹⁴ Also, that he will propose to the US congress a Bill that will ban bank holding companies from owning, investing in, or sponsoring hedge funds or private equity funds, and from engaging in proprietary trading. This essentially means that US banks will have to spin off their proprietary trading divisions. As the President said, banks will not be allowed to use their capital for “trading unrelated to serving customers.”¹⁵ The President called the ban the ‘Volcker Rule’, in recognition of the former Federal Reserve chairman, Paul A. Volcker, who

¹¹ Proposal for a Regulation on Community macro prudential oversight of the financial system and establishing a European Systemic Risk Board, Brussels, 23.9.2009, COM(2009) 499-503 final; Proposal for a Directive Amending Directives 1998/26/EC, 2002/87/EC, 2003/6/EC, 2003/41/EC, 2003/71/EC, 2004/39/EC, 2004/109/EC, 2005/60/EC, 2006/48/EC, 2006/49/EC, and 2009/65/EC in respect of the powers of the European Banking Authority, the European Insurance and Occupational Pensions Authority and the European Securities and Markets Authority, Brussels, 26.10.2009, COM(2009) 576 final.

¹² Regulation (EC) No 1060/2009 of the European Parliament and of the Council of 16 September 2009 on credit rating agencies OJ L 2009, L 302/1.

¹³ Communication from the Commission, ‘Ensuring Efficient, Safe and Sound Derivatives Markets: Future Policy Actions’, Brussels 20.10.2009, COM(2009) 563 final.

¹⁴ Since 1994, the share of insured deposits that can be held by any one bank has been capped at 10 percent. The administration wants to expand that cap to include all liabilities, to limit the concentration of too much risk in any single bank. Wall Street Journal

¹⁵ Sewell Chan and Eric Dash, ‘Obama’s Move to Limit “Reckless Risks” Has Skeptics’, *NY Times*, 21 January 2010, available at <http://www.nytimes.com/2010/01/22/business/22banks.html>

is widely thought as the foremost champion of the proposed legislation, who has made several times in the recent past the case for separation.¹⁶

Before the surprise announcement of the ‘Volcker Rule’ by President Obama, the most vocal critic of the mega-bank business model was Mervyn King, the Governor of the Bank of England (BoE).¹⁷ But he was by no means the only critical voice raised against the mega-bank business model.¹⁸ King has specifically argued that separation of the deposit and lending business, so called ‘utility’ banking, from capital markets activities, so-called ‘casino’ banking, would be a good way to avert a future financial crisis, as it would curb mega-banks ability to free ride over the implicit government guarantee.¹⁹ Also other influential commentators had observed that the initial US Treasury proposals did nothing to address the main problem arising from the crisis, which was the fact that a handful of very big global financial institutions would cause a global meltdown if they were allowed to fail.

The Obama proposals do not address the problem of the ‘too-big-to-fail’ institution in its global context, which is the only proper context, given the strong cross-border presence of mega-banks and the geographic distribution of their deposits/assets/business base. In an

¹⁶ See Matthew Benjamin and Christine Harper, ‘Glass-Steagall’s Specter Returns to Haunt Wall Street’, 10 March 2009, available at http://www.bloomberg.com/apps/news?pid=20601087&sid=ad_KRWTbPsJw&refer=home.

¹⁷ ‘The massive support extended to the banking sector around the world, while necessary to avert economic disaster, has created possibly the biggest moral hazard in history.’ Speech by Mervyn King, *supra* note 1, 4. See also Mervyn King, ‘Finance - A Return from Risk’, Speech by the Governor of the Bank of England to the Company of international Bankers, 17 March 2009, at 4. Available at: <http://www.bis.org/review/r090319a.pdf>

¹⁸ Critics included the former Conservative Party Chancellor Nigel Lawson. See Nigel Lawson, ‘Capitalism needs a revived Glass-Steagall’, *Financial Times* 15 March 2009, available at http://www.ft.com/cms/s/0/9a8f3b22-1191-11de-87b1-0000779fd2ac.html?ncklick_check=1.

¹⁹ The Governor of the BoE said in his Mansion House Speech: ‘It is not sensible to allow large banks to combine high street retail banking with risky investment banking or funding strategies, and then provide an implicit state guarantee against failure’. See ‘Mervyn King Presses His Case to Limit Size of banks’ *The Times*, June 18, 2009, available at http://business.timesonline.co.uk/tol/business/industry_sectors/banking_and_finance/article6523514.ece

attempt to address these shortcomings and identify a workable separation model that would be acceptable both within and outside the US, this paper develops a more elaborate separation model utilizing also the main ideas enshrined in the Obama proposals. These are that, in order to make banks safer and not too-big-to-fail, restrictions must be imposed on their size and the kind of activities they are allowed to undertake though the use of their capital.

The paper submits to debate three main ideas: (a) the identification a workable model for effective separation of ‘utility’ banking from ‘casino’ banking is an over-riding duty of academic thinkers and policy-makers, given the key role these institutions played in the 2007-2009 crisis; (b) while the alternative approaches to the ‘too-big-to-fail’ issue are very interesting, they are no less challenging in their implementation and do not necessarily signal a much easier or more cost-effective path than institutional separation; and (c) only separation can entirely eliminate the moral hazard created by ‘too-big-to-fail’ institutions. Therefore, the paper presents for discussion a set of general principles that should be followed by any separation model. It also presents a model for a three-prong institutional separation of the main types of banking activity.

The suggested model is flexible and well adaptable to true market conditions and prevailing political considerations in the sense that it does not ignore the benefits of the global financial integration and the universal bank tradition of many G20 countries. It is designed with the intention of fostering market discipline in the banking sector and preserving the role of banks as steam-engines of growth, without compromising depositors’ and taxpayers’ interests. Given that the biggest regulatory challenge in this context is inevitably how to effectively separate the riskier and less risky types of banking in an environment of heightened interconnectedness in the global financial system, the suggested model makes extensive use of activity boundaries and position limits.

Inevitably, separation of the different types of banking activity would be a very messy and expensive exercise. For example, any workable separation model would also entail institutional restructurings, forced business and asset partition, imposition of arbitrary position limits, and boundaries to business activity. Restrictive regulations of this kind are bound to be burdensome and prove unpopular, even though they are strongly but implicitly present in the current prudential regulation model. Yet, this Paper argues that the model separation presented here may not be more expensive to users of capital than new capital, liquidity, and leverage regulations.

The Paper is divided in six sections, beginning with this Introduction. The second section discusses the emergence and merits of financial conglomeration as illustrated by the mega-bank business model. The third section highlights the many risks created by the operation of ‘too-big-to-fail’ banks. The fourth section discusses all proposals for the reform of ‘too-big-to-fail’ institution. The fifth section describes a new model for the separation of the banking activity along institutional lines. The sixth section concludes.

2. THE TROUBLE WITH ‘TOO-BIG-TO-FAIL’ BANKS

2.1 The Emergence of the Mega-bank Model

With the exception of Continental Europe (chiefly Switzerland and Germany), mega-banks emerged in the rest of the western world in the 1990s as a result of three factors. First, financial innovation led to the eradication of the traditional boundaries between commercial and investment banking, as a host of derivatives products and financing techniques could be used by both kinds of institutions, and created a gigantic move towards dis-intermediation. The latter meant that profit margins became ever thinner for traditional lenders that did not normally engage in capital market activities. At the same time, investment banks needed an ever larger capital and funding base in order to compete successfully under the new

conditions. That larger capital and funding base could be ensured through the merger of an investment bank with a lending institution, which at the time, looked like a ‘match made in heaven’ for shareholders, as investment banking would bring higher profit margins and commercial banking the wide, cheap, and safe funding basis ensured by deposit-taking.

The second reason was the global move towards financial liberalisation, which lies at the heart of economic globalisation, together with trade liberalisation. International financial liberalisation was achieved through the abolition of national controls over cross-border capital flows and of restrictions over foreign entry to domestic financial services markets. Globalisation, in turn, posed western financial services institutions and their public regulators with two questions: first, how to build big institutions that could compete successfully at the global stage and, second, by which means this global industry should be regulated. As said earlier, the emergence of mega-banks was the direct answer to the first question. The second question was answered through the nearly universal endorsement of the prudential regulation standards²⁰ issued in the last two decades by the Basle Committee on Banking Supervision (BCBS).²¹ The disproportionate influence of the western financial services industry over the workings and standard-setting of the BCBS meant that Basle standards fostered further the

²⁰ See J. J. Norton, *Devising International Bank Supervisory Standards* (The Hague: Martinus-Nijhoff, 1995), and Norton (ed.), *Bank Regulation and Supervision in the 1990s* (Kluwer Law, 1991); Norton & I. Fletcher, *International Banking Regulation and Supervision: Change and Transformation in the 1990s* (Kluwer Law International, 1994).

²¹ Basle Committee’s standard-setting output falls into largely two categories: principles for the cross-border supervision of internationally active banks and capital adequacy standards. See Basle Committee on Banking Supervision, ‘Core Principles for Effective Banking Supervision’, Basle, September 1997, revised in October 2006. Basle Committee on Banking Supervision, ‘International Convergence of Capital Measurement and Capital Standards, A Revised Framework’, Updated November 2005. For a comprehensive review of the Basle Capital Adequacy Standards and especially of the Basle II framework see Hal Scott, *International Finance: Law and Regulation* (London: Sweet & Maxwell, 2nd ed., 2008), ch 7. For a critical review of the Basle Committee’s workings and rulemaking processes see Kern Alexander *et al.*, *Global Governance of Financial Systems* (Oxford: OUP, 2006), pp. 37-55. Also for perceptive analysis that still remains relevant see Norton, *Devising International Bank Supervisory Standards*, ch. 4.

move towards mega-banks. Of course, as mega-banks grew, they posed an ever larger risk to national and global systemic stability, the one public good that BCBS standards were supposed to safeguard over any other.

The third reason was deregulation of the financial services industry in the western world. First, in the UK, where unlike the US, separation between commercial and investment banking institutions was informal, so called ‘big bang’ of 27 October 1986 meant the disappearance of traditional stock jobbers.²² ‘Big bang’ legislation, probably the centrepiece of Thatcher era drive towards financial liberalisation, abolished the fixed commissions’ regime for London Stock Exchange (LSE) and opened access to LSE trading and attendant broking services to all financial houses. This created a chain reaction which gradually led to the acquisition of most of the traditional discount houses and merchant banks, with very few exceptions, either by foreign competitors or large UK commercial banks. The latter meant a huge shift in the business culture of big UK banks, which eventually culminated to the disastrous acquisitions and business policies followed by the Royal Bank of Scotland and the Halifax Bank of Scotland two decades later.

The US, on the other hand, had in place the last relics of depression era legislation, so called Glass-Steagall Act,²³ until 1999. The core sections of the Banking Act of 1933 (defined as the Glass-Steagall Act) were sections 16, 20, 21, and 32. Section 16, as amended by the Banking Act of 1935, generally prohibited Federal Reserve member banks from purchasing securities for their own account. Sections 16 and 21 also forbade deposit-taking institutions from engaging in the business of ‘issuing, underwriting, selling, or distributing, at

²² On the disappearance of the LSE’s stock jobbers and their business culture see Bernard Attard, ‘Making a Market, The Jobbers of London Stock Exchange, 1800-1986’ (2000) 7 *Financial History Review* 5.

²³ Banking Act of 1933, 48 Stat. 162, codified in several sections of the United States Code, now repealed.

wholesale or retail, or through syndicate participation, stock, bonds, debentures, notes or other securities', except holdings of US Treasury bills and other public sector debt obligations. Section 16 permitted commercial banks to purchase and sell securities directly, without recourse, solely on the order of and for the account of customers. Section 20 forbade member banks from affiliating with a company 'engaged principally' in the 'issue, flotation, underwriting, public sale, or distribution at wholesale or retail or through syndicate participation of stocks, bonds, debentures, notes, or other securities'. Section 32 prohibited a member bank from having interlocking directorships or close officer or employee relationships with a firm 'principally engaged' in securities underwriting and distribution. Section 32 applied even if there was no common ownership or corporate affiliation between the commercial bank and the investment company. According the U.S. Supreme Court the Act was intended to prevent banks from endangering themselves, the banking system, and the public from unsafe and unsound practices and conflicts of interest.²⁴

In 1956 US Congress further mandated through the Bank Holding Company Act the separation of banking and insurance underwriting business.²⁵ However, by the time of its formal repeal in 1999,²⁶ Glass-Steagall type restrictions had been seriously eroded, especially

²⁴ 'The legislative history of the Glass-Steagall Act shows that Congress also had in mind and repeatedly focused on the more subtle hazards that arise when a commercial bank goes beyond the business of acting as fiduciary or managing agent and enters the investment banking business either directly or by establishing an affiliate to hold and sell particular investments. This course places new promotional and other pressures on the bank which, in turn, create new temptations.' *Investment Co. Inst. v. Camp*, 401 U.S. 617, at 630-631 (1971), *per* Justice Stewart. Yet Glass-Steagall was not without problem areas. Sections 20 and 32 did not apply to non-member banks and savings and loan associations. As a result, these institutions were legally free to affiliate with securities firms meaning that the restrictions applied unevenly to essential similar (at least in their function) institutions. Furthermore, the cash management accounts of securities brokers, in many respects functioning similarly as checking accounts had been judged not to amount to deposit taking activity as specified in the Act.

²⁵ Bank Holding Company Act of 1956, Pub. L. No. 511, 70 Stat. 133.

²⁶ Gramm-Leach-Bliley Financial Services Modernization Act, Pub. L. No. 106-102, 113 Stat. 1338 (1999). For today's reader, who has the benefit of hindsight, it seems inexplicable that so few US senators opposed at the time the repeal of Glass Steagall Act. *See* 'Glass-Steagall Act: The Senators And Economists Who Got It Right',

as regards the ability of commercial banks to acquire securities affiliates,²⁷ and the trend toward mega-mergers between financial services institutions had already set in. This trend was culminated in the ‘marriage’ of Citicorp (a banking company) with Travellers, a financial conglomerate with several insurance subsidiaries and a securities firm (Salomon Smith Barney) to produce Citigroup. This merger preceded and probably ‘coerced’ the repeal of Glass-Steagall Act.²⁸ It was followed by the subsequent merger of JP Morgan with Chase Manhattan in 2000. These mergers made mega-banks a menacing reality both to competitors and consumers and the financial system.²⁹

The same drive toward de-regulation, by means, in this case, of harmonization legislation with the explicit intent of levelling the playing field between continental European universal banking and the informal separation model operated in Britain, meant that EU legislation actively promoted the universal bank model.³⁰ Thus, it fostered the creation of

Huffington Post, 11 May 2009, available at http://www.huffingtonpost.com/2009/05/11/glass-steagall-act-the-se_n_201557.html

²⁷ *E.g.*, in June 1988 the U.S. Supreme Court (by denying certiorari) upheld a lower court's ruling accepting the Federal Reserve Board's April 1987 approval for member banks to affiliate with companies underwriting commercial paper, municipal revenue bonds, and securities backed by mortgages and consumer debts, as long as the affiliate does not principally engage in those activities.

²⁸ See for the influence of the Citigroup merger on the repeal of Glass-Steagall Act and the enactment of the Gramm-Leach-Bliley Act, see Wilmarth, *supra* note 8, 972-975.

²⁹ The figures that this consolidation represented in the US are staggering: ‘More than 5,400 mergers took place in the U.S. banking industry from 1990 to 2005, involving more than \$5.0 trillion in banking assets. In seventy-four of those mergers, both the acquiring bank and the target bank had assets exceeding \$10 billion. As a consequence of the bank merger wave, the share of U.S. banking assets held by the ten largest banks more than doubled, rising from twenty-five percent in 1990 to fifty-five percent in 2005. The three largest U.S. banks—Citigroup, Bank of America (BoFA) and JP Morgan Chase (Chase)—expanded rapidly after 1990, and each bank held more than \$1.5 trillion of assets at the end of 2007. Wachovia, the fourth largest U.S. bank, also grew rapidly, and its assets exceeded \$780 billion at the end of 2007. Wilmarth, *supra* note 8, 975-976. (notes omitted).

³⁰ The chief example of such EU legislation is the Second Banking Directive 89/646/EEC [1989] OJ L 386/1, replaced by Directive 2006/48/EC [2006] OJ L 177/1 relating to the taking up and pursuit of the business of credit institutions. The Second Banking Directive allowed deposit-taking European Banks to also engage in the kind of investment market activities that were usually reserved, at least outside of Germany, for securities firms and non-deposit taking investment banks.

several mega-banks in the UK and rest of Europe,³¹ though of a size much smaller than that of their US counterparts. Finally, liberalization and the dismantling of barriers between commercial and investment banking also meant a large number of cross-border mergers and acquisitions,³² creating large complex financial conglomerates with very strong international business, asset and deposit base.

2.2 The Suggested Advantages of Financial Conglomerates

The proponents of the mega-bank model have always maintained that conglomeration has allowed banks to reap serious economies of scale in their operations, significantly raising their profitability, and to foster innovation. In fact, the separation model is regarded as creating weaker banks and the more diverse source of income of universal banks, due to their multiple business lines, was long thought to make them more stable and better equipped to withstand the pressures of a financial crisis or of an economic recession.

In this context, some of the most serious objections to a proposal of regulatory separation of banking business may be derived from studies suggesting that restrictions on bank activities are not conducive to bank stability and development.³³ It is argued there that permitting banks to conduct securities and insurance activities presents several advantages³⁴:

³¹ 'Nearly 1,800 bank mergers took place in the Euro zone and the United Kingdom (U.K.) from 1990 to 2001. An additional 350 bank mergers were completed in the European Union (EU) from 2002 to 2006. As in the United States, a number of very large bank mergers were completed in the U.K. and Europe, including three mergers from 1992 to 1999 among leading U.K. banks (HSBC-Midland, Lloyds-TSB and Royal Bank of Scotland-National Westminster) and two combinations among four of the largest French banks (BNP-Paribas and Credit Agricole-Credit Lyonnais); a merger between two major Swiss banks, which produced UBS; and the 2007 acquisition of ABN AMRO, the largest Dutch bank, by a group of three European banks led by Royal Bank of Scotland (RBS).' Wilmarth, *supra* note 8, 977 (notes omitted).

³² *Ibid.* 977-978.

³³ JR Barth, G Caprio, Jr, and R Levine, 'Bank Regulation and Supervision: What Works Best?' NBER Working Paper No. W9323, November 2002.

(a) exploitation of economies of scale and scope in gathering and processing information about firms, (b) risk diversification, (c) building a diversified base of activities leads to a more stable source of income and thus more stable banks, (d) building reputation capital with clients, and (e) increase the franchise value of banks and thereby augment incentives for banks to behave prudently.³⁵ Also it is suggested that restricting the kind of activities a bank may undertake hinders bank development³⁶ and thus economic growth, since bank development has been found to have a strong positive influence over economic growth.³⁷ However, as discussed in the next section, many of the aforementioned welfare gains, were grossly exaggerated.³⁸

3 'TOO-BIG-TO-FAIL BANKS' ARE TOO BAD FOR MARKET WELFARE

3.1 Introductory Remarks

Criticism levelled at mega-banks specifically targets four adverse phenomena inextricably linked to their operation, which also seriously harm market welfare. First, the implicit government guarantee results in a very serious moral hazard problem as 'too-big-to-fail' banks show a marked preference for excessive risk-taking³⁹ and disproportionate executive

³⁴ See JR Barth, RD Brumbaugh and JA Wilcox, 'The Repeal of Glass-Steagall and the Advent of Broad Banking' (2000) 14 *Journal of Economic Perspectives* 191; S Claessens and D Klingebiel, 'Competition and Scope of Activities in Financial Services', World Bank, mimeo, April 2000.

³⁵ For the perceived relationship between franchise value and bank management's incentives to behave prudently see M Keeley, 'Deposit Insurance, Risk, and Market Power in Banking' (1990) 80 *American Economic Review* 1183-1200; RS Demsetz, MR Staidenberg, and PE Strahan, 'Banks with Something to Lose: The Disciplinary Role of Franchise Value' (1996) 2 *Economic Policy Review* 1; S Ancharya, 'Charter Value, Minimum Bank Capital Requirements and Deposit Insurance Pricing in Equilibrium' (1996) 20 *Journal of Banking and Finance* 351.

³⁶ Barth, Caprio & Levine, *supra* note 33, 31-32.

³⁷ R Levine, N Loayza, and T Beck, 'Financial Intermediation and Growth: Causality and Causes' (2000) 46 *Journal of Monetary Economics* 77.

³⁹ The FSA observes: 'losses arising from risky proprietary trading were "socialised" via government and central bank support to large integrated financial institutions, and that the scale of those risky activities may have been swollen by the expectation of such support and in some cases by the availability of retail deposit funding.' FSA Discussion Paper, *supra* note 5, 22.

compensation. Second, their being shielded from normal markets forces means that they misuse financial innovation. Third, the fact that ‘too-big-to-fail’ institutions operate under a government guarantee distorts competition. The fourth and less discussed consequence of the emergence of mega-banks is that they have significantly contributed to homogeneous investment behaviour,⁴⁰ depriving the market from its natural stabilizers, *i.e.*, diverse market actor behaviour and positions.⁴¹ This, in turn, has greatly increased endogenous risk,⁴² namely the possibility of the financial system failing by an event generated within it, rather than outside of the system.

3.2 ‘Too-big-to-fail’ Banks and Market Discipline

The chief objective of banking regulation is the protection of systemic stability and prevention of collapse of individual institutions. In the past twenty years, the regulatory tool that has mostly been relied upon to buttress banking institutions’ financial health and soundness is capital adequacy standards. The standards currently applicable to the majority of international banks are those fashioned by the Basel Committee on Banking Supervision. The third pillar of the Basel II Accord stipulates an increased number of regulatory and market disclosures by regulated banks,⁴³ in order to enhance market discipline.⁴⁴

⁴⁰ See K Alexander, J Eatwell *et al.*, ‘Financial Supervision and Crisis Management in the EU’, prepared for the European Parliament’s Committee on Economic and Monetary Affairs, December 2007, IP/A/ECON/IC/2007-069, 3-7.

⁴¹ *Ibid.* 5.

⁴² Leonhard Fischer, ‘Major Risks of International Banking’ in Peter Nobel and Marina Gets (eds.), *Law and Economics of Risk in Finance* (Schulthess, Zürich 2007), 124 -125.

⁴³ Under Art. 145 *et seq.* and Annex XII of Directive 2006/48.

⁴⁴ ‘See Basel II: The New Basel Capital Accord - Third Consultative Paper’, April 2003, Part 4: The Third Pillar – Market Discipline. A. General Considerations, paras 757 *et seq.*

Arguably, the concept of market discipline and its processes lack a precise definition,⁴⁵ and seem to have developed mainly as the product of intuition.⁴⁶ Broadly defined market discipline encompasses the discipline imposed by shareholders and the market for corporate control on bank management and discipline imposed by subordinated short-term creditors,⁴⁷ as well as other creditors,⁴⁸ by bank customers, and even highly mobile groups of bank employees.⁴⁹ All of the above are assumed to have the right incentives to monitor bank behaviour in order to avoid being caught in a bank failure and a messy winding up that would bring them large losses. The most important mechanism to facilitate market discipline is thought to be disclosure of accurate information to the market, and the market's ability to process it properly.⁵⁰ Also the mix of debt and equity chosen by a bank is regarded as a strong determinant of the effectiveness of market discipline.⁵¹

Of course, market discipline works if market actors have sufficient incentives to fulfil their monitoring role and there are no impediments to information signals.⁵² However, at the

⁴⁵ David T Llewellyn, 'Inside the "Black Box" of Market Discipline' (2005) 25 *Economic Affairs* 41.

⁴⁶ Costas Stephanou, 'Rethinking Market Discipline', World Bank Policy Brief, June 2009.

⁴⁷ A view that was tentatively based on Charles W Calomiris and Charles M Kahn, 'The Role of Demandable Debt in Structuring Optimal Banking Arrangements' (1991) 81 *American Economic Review* 497 and Charles W. Calomiris, 'Building an Incentive-Compatible Safety Net' (1999) 23 *Journal of Banking and Finance* 1499.

⁴⁸ Donald P Morgan and Kevin J Stiroh, 'Bond Market Discipline of Banks: Is the Market Tough Enough?' *Federal Reserve Board of New York Staff Report No. 95*, December 1999. Available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=207148 (accessed on 15 June 2009).

⁴⁹ David T Llewellyn and David G Mayes, 'What is Market Discipline?' in George G. Kaufman, *Market Discipline in Banking: Theory and Evidence* (Elsevier, 2003) 186–188.

⁵⁰ *Ibid.* 189–193.

⁵¹ Adam B. Ashcraft, 'Does the Market Discipline Banks? New Evidence from the Regulatory Capital Mix' *FRB of New York Staff Report No. 244*, March 2006, available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=901805 (accessed 1 July 2009).

⁵² Llewellyn and Mayes, *supra* note 50, 190.

individual institution level, a number of perverse incentives substantially weaken the importance of market discipline. The most important of these perverse incentives is the possibility of public bank rescues⁵³ and deposit insurance.

The Northern Rock incident proved beyond doubt that inadequate cover by deposit insurance may make a bank susceptible to a depositors' run.⁵⁴ Thus, it is assumed that deposit insurance fosters systemic stability, although it weakens market discipline.⁵⁵ The fact that all big banks enjoy an implicit public guarantee means, in practice, that even badly run banks will probably not be allowed to fail, and if they do the deposit insurance scheme (for depositors) and the taxpayer will cover most of the other creditors' losses.

By its very nature the financial network creates chains of claims increasing institutions' exposure to each other creating very strong ties of mutual economic dependence (interconnectedness). Counter-exposures are often incapable of automatic netting and set off. Although interconnectedness is an essential element of the financial network, it may also increase its vulnerability, especially because bank collapses are highly contagious and they can evolve, aided by market panic, into full-scale financial cascades threatening the stability of the financial system. However, given the availability of the government guarantee, banking institutions have a strong incentive to grow their asset book (loans).⁵⁶ The rationale

⁵³ *Ibid.* 191. *E.g.*, evidence from the bond markets well before the implementation of Basel II showed that bond-markets were taking a softer approach to big banks assuming that they were too-big-to-fail or they were simply too complex in their structure for the bond market to understand and price effectively. See Morgan and Stiroh, *supra* note 49.

⁵⁴ House of Commons, Treasury Committee, *Fifth Report of Session 2007–08, The Run on the Rock* (24 January 2008).

⁵⁵ Inter-American Development Bank, 'Unlocking Credit: the Quest for Deep and Stable Bank Lending – Economic and Social Progress in Latin America, 2005 Report' (2004), ch. 7.

⁵⁶ 'Why were banks willing to take risks that proved so damaging both to themselves and the rest of the economy? One of the key reasons – mentioned by market participants in conversations before the crisis hit – is that the incentives to manage risk and to increase leverage were distorted by the implicit support or guarantee

behind this behaviour is simple. The larger the institution and the more interconnected, the more likely it is that its failure will also drag down other interconnected institutions.⁵⁷ In fact, the bigger the institution and the more interconnected, the more likely it is that the government will rescue it in the event of failure,⁵⁸ giving bank management a powerful incentive to expand a banking institution's balance sheet, obliterating the restraining power of market discipline.

Nonetheless, even if it was possible to eliminate moral hazard and design appropriate incentives so that, at least, bank creditors become effective monitors of banks, market monitoring would still contribute little in terms of preventing institutional failures and/or safeguarding systemic stability for two reasons. First, as Hellwig observes⁵⁹:

Because of systemic interdependence, the individual bank's risk exposure cannot be ascertained by just looking at the bank's assets and liabilities, on balance sheet and off balance sheet. If the bank's asset position involves a certain risk and the bank has hedged this risk by contracting with a third party, the effectiveness of the hedge depends on the third party's ability to fulfil its obligations when needed. If the risk in question is of macroeconomic dimension, an interest rate risk, exchange rate risk, or a housing-price risk, the counterparty's ability to fulfil its obligation depends on how many similar contracts it has concluded with other market participants. If risk correlations across contracts are such that the counterparty to the hedge must deliver on many of them at the same time, this in itself may destroy the counterparty's viability.

provided by government to creditors of banks that were seen as "too important to fail". Such banks could raise funding more cheaply and expand faster than other institutions. They had less incentive than others to guard against tail risk. Banks and their creditors knew that if they were sufficiently important to the economy or the rest of the financial system, and things went wrong, the government would always stand behind them. And they were right.' Mervyn King, *supra* note 1, 3.

⁵⁷ The Goodhart Report calls this risk the 'interconnectedness spillover'. Goodhart Report, *supra* note 6, 20–21.

⁵⁸ *Ibid.*

⁵⁹ Martin Hellwig, 'Systemic Risk in the Financial Sector: An Analysis of the Subprime-Mortgage Financial Crisis', Max Planck Institute for Research on Collective Goods Bonn 2008/43, November 2008, 59–60. Hellwig accurately notes that: 'The difficulties that the monoline insurers of credit risk in mortgage-backed securities have had over the past year – or the more recent crisis of AIG – provide a telling example of the problem.' *Id.*

In today's markets, there is no private institution that potentially has the ability, resources, and access to information to be able to conduct a risk analysis of all financial institutions, regulated and unregulated. Even if such an institution existed, the colossal costs of universal monitoring would far exceed the expected benefits. Second, due to banks' susceptibility to runs, for business competition reasons, or because of relevant confidentiality agreements, certain crucial data on a bank's business and the performance or profitability of certain business relationships, will never be made public on a disaggregated basis.⁶⁰ As a result, the effectiveness of monitoring of individual institutions by the market relying on publicly available data becomes much less important.

3.3 Mega-banks and the Misuse of Financial Innovation

The 'contamination' of big commercial banks by the operating and management style of investment banks has weakened risk management controls and meant that big banks increased their leverage, raising the risk of systemic collapse. Not a direct consequence of conglomeration, but indicative of the casual attitude to risk that it created, was the excessive use by banks of asset securitization and the adoption of the hazardous originate-to-distribute model, which meant that mega-banks were the prime promoters of subprime mortgages and the principal drivers behind their growth to disastrous levels.⁶¹ This also led to a very serious relaxation of credit risk management controls by originator banks.⁶² In addition, big banks' proprietary trading desks, which essentially operate as hedge funds, could fuel their risky

⁶⁰ In fact, such information is regarded by the EC Directive 2006/49 as 'proprietary' or 'confidential', respectively. Annex XII, paras 2–3.

⁶¹ Wilmarth, *supra* note 8, 1017–1022.

⁶² Emiliós Avgouleas, 'The Global Financial Crisis, Behavioural Finance and Financial Regulation: In Search of a new Orthodoxy' (2009) 9 *Journal of Corporate Law Studies* 121.

ventures into the world of capital markets and markets for exotic OTC derivatives through recourse to the cheap funding base of government guaranteed deposits.⁶³

Furthermore, increased investment banking activity and the excessive use of securitization and financial innovation by mega-banks led to welfare losses instead of the famed gains. Investment banking and financial innovation enjoyed great prominence in the 1990s and 2000s because of industry's emphasis on dis-intermediation and the promotional clout of mega-banks and of big investment banks that put a very appealing gloss on a high-risk activity of no social value. However, investment banking is nothing more than the classic zero sum game taking place in capital markets, and is incapable of bringing any long-term gains.⁶⁴ As a result, the financial system did not innovate in a way that would enhance growth and manage household risks. Instead financial innovation, driven by tax and regulatory arbitrage, obfuscated bank balance sheets undermining market discipline, and regulatory monitoring and increased risk, which was warehoused in opaque parts of the system.

3.4 Financial System Homogenization: The Impact of 'Too-big-to-fail Banks' on Risk Management and Risk Diversification

The involvement of mega-banks in multiple business activities, instead of commercial banks' 'old-fashioned' focus on utility banking business and investment houses' confinement to capital markets' business, was thought to be, as mentioned in section 2.2, a source of stability for the financial system. However, in practice the exact opposite was true. Mega-banks

⁶³ George Soros, 'Do not Ignore the Need for Financial Reform' Financial Times, 25 October 2009. Available at <http://www.ft.com/cms/s/0/a12061e0-c196-11de-b86b-00144feab49a.html>

⁶⁴ See United Nations Conference on Trade and Development (UNCTAD), 'The Global Economic Crisis, Systemic Failures and Multilateral Remedies', New York & Geneva, 2009, 4.

neither diversified their business lines enough nor did they use innovative financial instruments to achieve effective risk management, leading instead to very homogeneous balance sheets and risk concentration. This resulted in a serious weakening of the resilience of the financial system, which thus became easy prey to the destabilizing forces, chiefly collapse of confidence, which allowed the subprime mortgage crisis to escalate into global market panic.

The first cause of mega-banks' homogeneous balance sheets was that diversification of business lines did not lead to diversified income sources and investment portfolios that would make banking institutions more resilient; instead they all adopted a 'follow the leader' strategy.⁶⁵ This explains why mega-banks, instead of exhibiting the fabled stability benefits of income and balance sheet diversification, proved to be very vulnerable to the first change in the financial winds necessitating the public rescues of most US, UK, and continental European mega-banks.⁶⁶ The second reason was, of course, strategic trade behaviour (so-called herding).⁶⁷ This was caused either by short-termist trade strategies within mega-banks (and other financial institutions), where momentum trading and follow the heard strategies

⁶⁵ As Haldane puts it: 'Firms migrated activity to where returns looked largest. As each new day dawned – leveraged loans yesterday, CDOs today, proprietary trading tomorrow – the whole sector was drawn to the new source of sunlight. Through competitive forces, finance engaged in a frantic game of follow-the-leader, played for real money.' Haldane, *infra* note 71, 7.

⁶⁶ As the FSA characteristically notes: 'Diversification may protect a large firm against idiosyncratic risk, but similar patterns of diversification by many large firms across the world may make the whole system more fragile. This is because all are exposed to the same risks and therefore to self-reinforcing collapses in confidence. A large globally diversified firm may, on average, be less likely to fail than a smaller, national firm concentrated in specific products and customers. However, its failure may be more likely to occur when the whole global system is in crisis . . .' FSA Discussion Paper, *supra* note, 11.

⁶⁷ DS Scharfstein and J Stein, "Herd Behavior and Investment" (1990) 80 *American Economic Review* 465; P Gompers and A Metrick, "Institutional Investors and Equity Prices" (2001) 116 *Quarterly Journal of Economics* 229.

provide significant short-term pay-offs, or by the cognitive limitations of rational and semi-rational actors managing bank investment activities.⁶⁸

Homogenisation would of course be an issue of lesser importance if mega-banks did not have such a strong presence in global markets and increased interconnectedness of the different parts of the global financial system⁶⁹ (as a result of other causes) had not raised manifold the risk of contagion among national financial systems. These in the past 20 years, have become ever more connected and thus interdependent, also becoming much more susceptible to cross-border spillovers.⁷⁰ Therefore, homogeneous markets and trading behaviour fostered by mega-banks are also a threat to global systemic stability.

3.5 Fiscal Implications and the Impact of ‘Too-Big-To-Fail’ Bank on Free Market Economy Principles

Banks increased both the size and leverage of their balance sheets to levels that threatened stability of the system as a whole. They remain extraordinarily dependent on the public sector for support. That was necessary in the immediate crisis, but is not sustainable in the medium term.⁷¹

The above statement by Mervyn King could also have been made by any Central Bank governor in a country where the banking sector has grown to levels unsustainable for the public purse⁷² and the taxpayer. According to the International Monetary Fund (IMF) the cost

⁶⁸ See Avgouleas, *supra* note 62, 33-34.

⁶⁹ Andrew Lo, ‘Regulatory reform in the wake of the financial crisis of 2007-2008’, (2009) 1 *Journal of Financial Economic Policy* 5, 23.

⁷⁰ Andrew Haldane, ‘Rethinking the Financial Network’, Speech delivered at the Financial Student Association, Amsterdam, April 2009, 12-13.

⁷¹ King, *supra* note 1.

of capital injections, asset purchases, guarantees and liquidity provision by G7 countries to rescue their banking sector amounts to 30 per cent of gross domestic product.⁷³ But this has not been spread evenly. A moderate estimate of the public rescue packages calculated by the size of bank loan write-offs is that these came to US\$ 604 billion for the UK, as compared to US\$ 814 billion for the entire Euro zone and US\$1,025 billion for the US, although both the US and the (aggregate) Euro zone GDP exceed that of the UK by a large multiple.⁷⁴ So the burden of public rescues fell more heavily on countries which had based their growth over the past twenty years on the continuous expansion of their financial sector and of consumer and corporate credit. This asymmetry also explains why no consensus has yet been reached at the international level with respect to the ‘too-big-to-fail’ bank.

Moreover, the existence of the ‘too-big-to-fail’ institution that perennially enjoys a government guarantee distorts fundamental principles of market economies, chiefly that of free competition and of the principle the failing enterprises should be allowed to ‘destruct’, so that (in a Schumpeterian fashion) capital can be channelled into new more productive uses. First, mega-banks are bound to have cheaper access to capital than other institutions in the financial sector, as they are seen to be virtually immune to failure. Second, for the same reasons, mega-banks may be able to offer more attractive terms to depositors or borrowers ‘stealing’ business from other institutions that do not enjoy the same level of (implicit) public backing. The above-mentioned distortions of competition should have raised very serious concerns regarding the application of anti-monopoly laws in the US, the UK, and the rest of Europe, especially following the considerable consolidation experienced by the banking

⁷² *E.g.*, this is also the case of Ireland, Switzerland, The Republic of Cyprus, quite possibly of the US, and of course Iceland.

⁷³ International Monetary Fund, ‘World Economic Outlook’, October 2009, 29, Fig. 1.8.

⁷⁴ In fact, according to the Governor of the BoE, the cost of direct or guaranteed loans and equity investment in the UK is closer to 1 trillion British pounds or 1.5 trillion US dollars, or two thirds of the UK’s GDP.

markets during 2007–2009. The reduction in competition because of consolidation has already led to strongly increased profitability for the institutions that survived the crisis, due to public rescues. This is clearly a situation that adulterates the fundamental legal and economic principles underpinning free market economies and may not continue for much longer.

4. REFORM PROPOSALS

4.1 Solutions to the ‘Too-Big-to-Fail’ Problem

The solutions to the problem of the ‘too-big-to-fail’ institutions suggested so far are not necessarily mutually exclusive and consist of:

- (a) Proposals for the separation of ‘utility’ from ‘casino’ banking. The rationale of these proposals is more or less the same: making systemically important banks smaller or less inter-connected and therefore less likely to be systemically important. Reduction of inter-connectedness is of course the result of restrictions placed on the multiplicity of contractual relationships between big banks and limiting the links between commercial banks and proprietary trading activities.⁷⁵
- (b) Increased capital requirements, leverage restrictions,⁷⁶ and liquidity requirements, and a global levy imposed on SIFIs. These proposals target the reduction of the probability of failure of SIFIs to a very low level and intend to reduce moral hazard, by essentially making the running of mega-banks more expensive for their owners and less profitable or less prone to the excesses that low equity capital and high leverage may lead. Thus, apart from higher capital and/or liquidity obligations for systemically

⁷⁵ FSA ‘Payments and clearing infrastructures also need to be sufficiently robust to withstand the failure of large participants’. Id.

⁷⁶ The Swiss regulator has unilaterally imposed on Swiss banks, a leverage ratio of 3% of core capital to total assets at group level and 4% of core capital to total assets for individual institutions. Banks’ domestic lending business is excluded from this requirement.

important banks relevant proposals also require that bank capital consists of common equity, or debt instruments that may be converted to common equity.⁷⁷

(c) Strengthened national and cross-border resolution frameworks focusing either on ring-fencing of foreign subsidiaries or the drawing up *ex ante* of recovery and resolution plans by SIFIs, so-called ‘living wills’,⁷⁸ which would also lead to a simplification of corporate structures.

(d) The fourth set of measures promotes improvements in infrastructure especially as regards trading in credit derivatives.⁷⁹ But as the latter is a general measure to protect systemic stability and impinges only indirectly on ‘the-too-big-to-fail’ problem, the discussion below will mainly focus on the first three approaches.

Arguably, a mix of approaches will be necessary to address the ‘too-big-to-fail’ problem, given the different types of institutions and national and cross-border contexts involved. At

Swiss Federal Banking Commission Decree, November 2008
www.finma.ch/archiv/ebk/e/publik/medienmit/20081204/mm-em-leverageratio-20081204-e.pdf

⁷⁷ The US Treasury has suggested that ‘systemically important firms (Tier 1 financial holding companies) should be subject to higher capital requirements than other firms to force them to internalise the costs of potential spillover effects’. See US Treasury, ‘Principles for Reforming the U.S. and International Regulatory Capital Framework for Banking Firms’, September 3, 2009, available at http://www.treas.gov/press/releases/docs/capital-statement_090309.pdf Also the Financial Stability Board (FSB) and the BCBS have established working groups which will make recommendations on this and related measures. See FSB, ‘Progress since the Pittsburgh Summit in Implementing the G20 Recommendations for Strengthening Financial Stability Report of the Financial Stability Board to G20 Finance Ministers and Governors’, 7 November 2009, available at http://www.financialstabilityboard.org/publications/r_091107a.pdf See also Basel Committee on Banking Supervision, ‘Report and Recommendations of the Cross border Bank Resolution Group’, September 2009, available at <http://www.bis.org/publ/bcbs162.htm>. and Basel Committee on Banking Supervision, ‘Strengthening the Resilience of the Banking Sector’, Consultative Document, December 2009, available at <http://www.bis.org/publ/bcbs164.pdf>

⁷⁸ This means an agreed *ex ante* contingency plan drawn up by the bank and its supervisors regarding the fate of the bank’s assets under different scenarios in times of stress. It should provide a clear picture of the different business units and structures operating within a financial group so that public authorities can then decide which parts may be rescued, sold, or allowed to fail. See Emiliios Avgouleas, Charles Goodhart, and Dirk Schoenmaker, ‘Living Wills as a Catalyst for Action’, Working Paper, January 2010; Herring, *supra* note 6; Paul Turner, ‘The Debate on Financial System Resilience: Macroprudential Instruments’, Barclays Annual Lecture, 22 October 2009.

⁷⁹ EC Commission Communication, ‘Ensuring efficient, safe and sound derivatives markets: Future policy actions’ 20 October 2009, COM(2009) 563 final

the same time, these approaches must preserve an integrated financial services market and not create regulatory arbitrage through an uneven playing field. This is also one of the advantages of the separation model proposed in section 5 over the Volcker Rule and the Kay model.

4.2 Suggested forms of Separation

Separation proposals may be divided to three categories: (i) suggestions for a reinstatement of Glass-Steagall type restrictions; (ii) John Kay's suggestion for an extreme form of 'narrow banking' whereby retail deposits are invested in risk free government assets,⁸⁰ and (iii) the 'Volcker' Rule announced recently by President Obama, which, although it requires a radical reshaping of the banking industry and leads to the break up of capital markets divisions of mega-banks, it does not amount to a wholesale return to Glass-Steagall Act restrictions. For the reasons explained below, although separation could prove an effective and sensible approach to the 'too-big-to-fail' problem, each of the above proposals presents a number of important shortcomings.

Admittedly, a wholesale return to Glass-Steagall type restrictions, whereby commercial banks wouldn't be able to access capital markets is not possible, given the scale and size of commercial banks', treasury operations and securitisation activities, which are essential for, at least, reasons of foreign exchange and credit risk management. In order to deal with this very real and practical obstacle, Professor Kay has suggested a spinoff of big bank's proprietary trading business, because this business differs only in scale from their Treasury operations, which are both necessary and legitimate. As a result, Kay's proposals focus on a division between 'narrow banks' accepting retail deposits, which should preferably be invested in risk free government bonds, and providing payment and other utility

⁸⁰ See John Kay, 'Narrow Banking, The Reform of Banking Regulation', Report for the Centre for the Study of Financial Innovation, September 2009, available at http://www2.johnkay.com/papers/JK_NarrowBanking.pdf

banking services. Since only ‘narrow banks’ would be allowed to accept retail deposits, all other business could be deregulated and be freed from micro-prudential regulation.

However, Professor Kay’s model has a number of flaws. First, at least in the case of US commercial banks, their total mismanagement of subprime lending was as culpable for their woes as their proprietary desk risks. Second, under the Kay model all forms of lending that could create an asset bubble such as consumer, mortgage, and business lending⁸¹ would be conducted by the quasi-regulated sector, perpetuating the risks that led to the global financial crisis,⁸² such as the too-big-to-fail problem. Leaving risky lending to the unregulated sector means also that there would be no effective protection against the macroeconomic implications of the boom and bust cycle in credit flows.⁸³

Arguably, in the 2007-2009 crisis, with the exception of Northern Rock and a few deposit-taking institutions in the US, the majority of financial institutions were seen as too-big-to-fail not as a result of an expected run on insured deposits, but rather because of interconnectedness. It is doubtful that market discipline will suddenly become so effective as to guard the unregulated sector against boom and bust cycles, interconnectedness, and information asymmetries that prevent the securitisation market to function effectively and above all to price risk properly. In addition, the unregulated sector would be seriously exposed to confidence runs,⁸⁴ which, in the absence of a lender of last resort facility, could generate and amplify liquidity shocks.

⁸¹ Kay suggests that funds for these activities would be raised from wholesale markets, securitisations and own capital, instead of retail deposits.

⁸² Martin Wolf, ‘Why Curbing Finance is Hard to Do’, *Financial Times*, 23 October 2009, 13.

⁸³ FSA Discussion Paper, *supra* note 5, 24-25.

⁸⁴ *Ibid.*

A third objection to the Kay model relates to the nature and riskiness of the sovereign bond markets. As the Asian crisis and the current sovereign debt crisis surrounding the Eurozone have shown, those instruments are not as safe as they are assumed to be. Also, there may be inadequate supply of such instruments to cover the entire stock of insured deposits in any given country, as is the case with the UK.⁸⁵ Arguably, there is no way around either problem, and Kay's suggestion for the government to issue additional gilts to on-lend to 'narrow banks' would essentially mean the 'nationalization' of credit risk without any capital or liquidity requirements in place to guard against it.⁸⁶

Although the general outline of the Volcker Rule does not present the many pitfalls of other similar proposals, President Obama's plan also contains several loopholes. First, it is so far very short on detail, for instance, it provides no definition of what is meant by proprietary trading. Second, it does not address the problem of excessive disintermediation through the use of securitisation, which means that lots of capital market participants hold now so much of consumer, housing, and public debt that they are themselves 'too-big-to-fail'. The consequences from the failure of Lehman Brothers, a non-deposit taking bank, constitute a very instructive example. All these institutions shall remain very interconnected to commercial banks and 'too-big-to-fail', unless commercial banks are faced with an upper securitisations ratio. The third pitfall the Obama proposals present is that they are unilateral and territorial, while a very big number of mega-banks and other 'too-big-to-fail' institutions are situated outside of the US (*e.g.*, Barclays, RBS, HSBC, BNP Paribas, UBS,

⁸⁵ [T]he entire stock of retail deposits with 100% gilts. UK insured retail deposits amount to approximately £950bn,²² which is slightly higher than the approximately £800bn total value of gilts currently outstanding.² However, it is likely that in excess of £300bn of these gilts are currently owned by insurance companies and pension funds which use them to back defined promises to customers (for example, annuitants and pensioners).' FSA Discussion Paper, *supra* note 5, 23-24.

⁸⁶ *Ibid.*

DeutscheBank, Credit Suisse). Of course, it will be very hard to persuade European governments to adopt a separation model that does not respect their tradition and the economic interests of their national institutions. Therefore, if an international solution is to be found to the issue of ‘too-big-to-fail’ banks and the risks these pose to the stability of the global financial system, further modifications are required that would both make the proposals of the US administration palatable outside of the US, especially in Europe, and minimise the risk posed by the European universal bank model.

4.2 Increased Capital, Liquidity, and Leverage Requirements

As mentioned above, the second set of regulatory reform proposals relating to the ‘too-big-to-fail’ problem refer to higher capital adequacy obligations imposed on banks that generate higher risk combined with upper leverage ratios. These proposals have so far found the highest degree of acceptance in the international banking community. They appear intellectually sound and have the added advantage of not significantly upsetting the status quo. Of course, as the crisis has proved the only form of bank capital that really acts as cushion is common equity or debt that may be converted to common equity if a ‘bankruptcy’ event occurs or the bank’s common equity is depleted.

However, for a number of reasons this approach may prove to have no distinct advantages over separation either in terms of social costs, measured as an increase to the cost of capital for users and impact on national output, expressed as a change of the Gross Domestic Product (GDP), or in terms of crisis prevention. First, additional capital requirements may prove expensive, although these costs could look minimal if the benefits of increased financial stability are taken into account. Higher capital requirements will inevitably increase the cost of credit and possibly reduce credit flow, thus having an impact on GDP. A group of economists from the UK’s National Institute of Economic and Social

Research have suggested that an increase of 1% in the severity (cost) of capital and liquidity regulations would amount over the next 9 years to an average reduction of GDP of 0.1% in the UK, slightly more in the eurozone, and of 0.2% in the US. A similar increase would, over the next 9 years, raise the average cost of capital to users by 0.3% in the UK, 0.025% in the US, and 0.5% in the eurozone.⁸⁷ However, as a 1% increase may be insufficient, if we assume a maximum 3% increase, then the cost to the user of capital and to the national economy, by means of reduction of output, for the next 9 years is shown to be significant. The result of such an increase is forecasted to be: an average reduction of GDP of 0.25% in the UK, 0.3% in the Euro zone, and 0.06% in the US, and an average increase in the cost of capital to users of 0.9% in the UK, 0.8% in the US, and 1.3% in the eurozone.⁸⁸ These are significant costs both to users of capital and financial institutions and weaken arguments that strict capital regulations are a cheaper and more cost-effective solution to the too-big-to-fail problem than separation.

Second, even excessive capital is not an adequate safeguard against interconnectedness and, in fact, the effectiveness of capital adequacy standards is not uncontroversial. They have been used as the preferred form of protective regulation for banks, because it was relatively easy to reach international consensus within the confines of the Basle Committee. There is, however, as Hellwig rightly points out, no evidence that capital requirements are a superior regulatory measure and protection mechanism compared to other alternatives.⁸⁹ Barth, Caprio, and Levine are equally sceptical about the impact of capital adequacy standards on bank stability, in the absence of other forms of regulation

⁸⁷ Ray Barell *et al.*, 'Banking Crises and Optimal Bank Regulation', Figures 8, 9, 10, 11, 12, and 13. This paper was presented in the 6th EUROFRAME Conference held at the British Academy on 12 June 2009. It is available at http://www.euroframe.org/fileadmin/user_upload/euroframe/docs/2009/EUROF09_Barrell_etal.pdf

⁸⁸ *Ibid.*

⁸⁹ Hellwig, *supra* note 60.

safeguarding it.⁹⁰ In addition, ‘requiring the banking system to hold more capital on average will not improve the resilience of the financial system if we do not also better match risk-taking to risk-capacity.’⁹¹

Moreover, unless the new capital framework is very rigid and not open to interpretation, making it patently unfit to be implemented in a multitude of jurisdictions or offshore banking is entirely prohibited/eradicated, banks will still find ways to bypass tighter capital regulations. As no other than former Federal Reserve chairman and free market ideas champion Allan Greenspan has publicly observed⁹²:

There is no doubt in my mind -- and I don't think merely raising the fees or capital on large institutions or taxing them is enough. I think that'll -- they'll absorb that; they'll work with it; and they will still be inefficient; and they'll still be using the savings.

Finally, unlike separation higher capital requirements do not foster competition in the financial sector. In other words, ‘piling up capital requirements may also act as an anti-competitive barrier, reinforcing the spectre of a few banks holding a government hostage because they are too-big-to-fail’.⁹³ This development would, in the process, increase supervisory problems, boost banker’s unhealthy influence over the political elites and lawmakers, and raise the possibility of a new systemic crisis.

4.3 ‘Living wills’

⁹⁰ See Barth, Caprio & Levine, *supra* note 33. See also T. Helman, K. Murdoch, and J. Stiglitz, ‘Liberalization, Moral Hazard in Banking and Prudential Regulation: Are Capital Requirements Enough?’ (2000) 90 *American Economic Review* 147–165.

⁹¹ See Avinash Persaud, ‘Too Much Capital, Not Enough Safety?’ Op-ed, 13 June 2009, available at <http://www.voxeu.org/index.php?q=node/3658>.

⁹² Allan Greenspan, ‘The Global Financial Crisis: Causes and Consequences’, Council on Foreign Relations, Speech in the C. Peter McColough Series on International Economics, October 15, 2009, New York. The transcript of Greenspan’s speech is available at http://www.cfr.org/publication/20417/c_peter_mccolough_series_on_international_economics.html

⁹³ *Ibid.*

Financial conglomerates in the past twenty years adopted very opaque corporate structures owed either to tax and regulatory arbitrage considerations (especially pertinent to shadow banking vehicles) or regulatory requirements. Lehman Brothers, a pure investment bank, with no significant commercial banking operations, had over 2,900 subsidiaries and affiliated companies.⁹⁴ This complexity however means that in the event of failure supervisors, the resolution authorities, creditors and insolvency officers face a very challenging task as they have to locate assets, lines of financing and authority, and creditor claims over a very complex web of business entities where the distribution of assets, business lines, of claims and management authority is highly obfuscated. Another function of ‘living wills’ would be to allow part bank rescues letting the unworthy parts of the business to ‘fail’, imposing also the cost of failure to shareholders and unsecured creditors.

Yet it is unlikely that ‘living wills’ would prove effective in the absence of a formally endorsed uniform resolution and insolvency model applicable to SIFIs, which would also clearly delineate the role of home and host country authorities and provide for a burden sharing mechanism, as argued by Goodhart, Schoenmaker, and Avgouleas.⁹⁵ First, the multitude of public and private law matters and conflicting interests arising from bank insolvencies could make the use of ‘living wills’ highly ineffective. Bank restructurings and/or insolvencies create, by their nature, a number of challenges to host state property,

⁹⁴ Richard Herring and Jacopo Carmassi, ‘The Corporate Structure of International Financial Conglomerates, Complexity and Its Implications for Safety and Soundness’ in: Allen N. Berger, Phillip Molyneux and John Wilson (eds.), *Oxford Handbook of Banking* (Oxford: Oxford University Press, 2010), 173-204.

⁹⁵ See Avgouleas, Goodhart, and Schoenmaker, *supra* note 78, and Charles Goodhart and Dirk Schoenmaker, ‘Fiscal Burden Sharing in Cross-Border Banking Crises’ (2009) 5 *International Journal of Central Banking* 141-165.

insolvency and possibly contract laws, as well as overriding depositor and consumer protection (or other public interest) legislation.⁹⁶

Second, in the absence of established forms of international fiscal sharing for bank rescues, governments will opt for a local approach requiring that foreign banks operating in their territory are incorporated as local subsidiaries separately capitalized and with the local subsidiary's assets being ring-fenced. However, if G20 countries opt for the local approach both operating synergies within financial groups and global financial integration will be seriously threatened. It is very likely that local regulators will take a rather protectionist approach leading to discrimination against foreign subsidiaries that would even be deemed legitimate under the prudential carve out in the General Agreements on Trade in Services 1994 (GATS).⁹⁷

However, no international agreement has been reached yet on either issue (fiscal burden sharing and the single resolution/insolvency model), reducing the immediate effectiveness of 'living wills'. Admittedly, 'living wills' are essential for any system of public regulation of 'too-big-to-fail' banks. Yet they would also prove useful under an internationally accepted system of separation of 'casino' from 'utility' banking. As said above, the effective operation of cross-border banking and future of financial globalisation is

⁹⁶ Emiliós Avgouleas, 'Banking supervision and the special resolution regime of the Banking Act 2009: the unfinished reform' (2009) 4 *Capital Markets Law Journal* 201-235.

⁹⁷ This is based on paragraph 2 of the Financial Services Annex of GATS which exempts from the implementation of GATS (liberalisation) measures intended to ensure the integrity and stability of the financial system. It does not give host jurisdictions the right to discriminate against foreign subsidiaries, but it certainly shelters regulatory fragmentation. *Inter alia*, the lack of clear definition of the 'carve out' allows host supervisors wide discretion in what qualifies as prudential rule and there is certainly no equivalence safeguard. See Mamiko Yokoi-Arai, 'GATS' Prudential Carve Out in Financial Services and its Relation with Prudential Regulation' (2008) 57 *International and Comparative Law Quarterly* 613, esp. 639-645 and K Alexander, K Alexander, 'The World Trade Organization and Financial Stability: The Balance between Liberalisation and Regulation in the GATS', CERF paper, University of Cambridge, 2003.

much dependent on devising an effective system for the cross-border resolution of international financial institutions.

5. A NEW MODEL FOR THE SEPARATION OF CONSUMER AND CORPORATE LENDING FROM INVESTMENT BANKING

5.1 The General Principles of a Successful Separation Model

A successful separation model must effectively serve the objectives of economic efficiency, and protection of institutional soundness, and systemic stability and should be premised on three central ideas. First, the separation model should not be rigidly polarized. Given the importance of bank lending to corporate businesses in many countries and the strategic role that universal banks play in their economy, a bipolar approach to separation would prove politically unpalatable. Arguably, creating a middle-tier bank that may engage in a number of mixed activities, allows for flexibility in the type of banking business an institution would like to pursue and better absorbs the tensions created by separation. Therefore, consensus is easier to be reached over a separation model that also allows room for an intermediate type of bank (tier II bank) which provides limited deposit insurance and higher returns. Such a bank would be more focused on business than on household lending, and would enjoy a greater degree of flexibility in its capital markets activities than (tier I) (narrow) savings banks.

Second, separation is not possible without a distinction of the kind of risks that banks are and are not capable to undertake and manage. This should be followed by the imposition of arbitrary position limits and limits on the use of financial innovation and bank participation in the capital markets. Thus, the most protected of the savings institutions (tier I banks) should have very limited capacity to participate in capital markets and should be able to do so only in order to hedge lending book risks and not to engage in proprietary trading or securities underwriting activities. These limits are more relaxed for tier II institutions that accept short-term but not current account deposits (reducing the scope for depositor runs) and

are more focused on business financing. Tier III (non-deposit taking institutions) are not subject to any restrictions regarding their capital markets activities and use of securitization.

Arguably, position limits, in their economic results, do not function any differently from upper leverage ratios and the approaches used to measure regulatory capital. International regulators may fix the upper boundary of position limits through rigorous research. There is no clear explanation as to why such research is less feasible than finding proper capital adequacy standards for various lending or trading book positions or upper leverage ratios.

Third, the banking system must not be only sound and safe, but should also facilitate economic growth by ensuring the smooth flow of credit to households and businesses. This function is preserved by creating two kinds of institutions that are each specialized in household and business financing, having different sources of funding and risk profile and a differentiated level of deposit guarantee, reducing both interconnectedness and moral hazard.

However, the separation model shown in Table 1 merely provides a first roadmap to future regulatory initiatives that will seek to radically redraw the boundaries of banking regulation. Arguably, if consensus is not reached, at least between the US, the other G20 countries and the EU Member States that are not members of the G20, any policy recommendations in this field will be of limited value. A country-based regime will not work for what is essentially a global industry, because of regulatory arbitrage. Therefore, the true value of the present proposal is that it provides a clear framework for the establishment of pluralistic and multi-tiered regimes for the regulation of banking institutions.

5.2 The Suggested New Model for the Separation of ‘Casino’ from ‘Utility’ Banking

As mentioned above the separation model described in Table 1⁹⁸ is a rather flexible way to segregate bank activities along business lines, creating thus a forceful risk diversification mechanism for the financial system. It also provides ample risk absorbers and a certain degree of flexibility, reducing, at the same time and at each stage, room for moral hazard. This model especially incorporates the requirement to have strong banks to finance the economy, which in many ways equals a need to have a flexible and effective regime for business financing.

Table 1

A New Model for Bank Authorization and Supervision					
Permitted Activities	Type of Licence	Deposit Insurance	Capital Regulation	Liquidity Insurance	Prohibited Activities
<ul style="list-style-type: none"> • Deposit taking • Consumer lending • Mortgage lending • SMEs lending • Treasury and Foreign Exchange (FX) operations • Lending to inter-bank markets up to <i>e.g.</i>, 30% of total deposits 	Tier I SAVINGS AND LOANS INSTITUTION ⁹⁹	90%+ Up to a limit that covers all small and medium sized deposits Pre-funded but co-insurance scheme	Light ¹⁰⁰ version of Basle II (as revised) No additional liquidity requirements No global levy	Lender of last resort (inevitably at subsidized rates) but pre-funded scheme	Balance sheet securitization not exceeding a set ratio (<i>e.g.</i> , 30–40%) of total assets Treasury and FX operations only in connection with balance sheet management Lending to the inter-bank market up to a ratio of total deposits (<i>e.g.</i> , up to

⁹⁸ This model was first published in a modified form in Avgouleas, *The Global Financial Crisis*, *supra* note 62.

⁹⁹ Banking institutions that may come under the tier I framework could include UK building societies and high street banks willing to leave the wholesale corporate lending markets, Spanish Caixas, German Sparkassen, and US Savings and Loans institutions.

¹⁰⁰ The case for strict capital adequacy regulations for this type of institution would be weak in any case given restrictions in the type of business it may undertake and the fact that most of its funding will be depositor money in any case.

Funding basis <ul style="list-style-type: none"> • (1) Deposits • (2) Shareholders' equity • (3) Bond issues • (4) Wholesale banking markets up to a ratio over other funding sources (<i>e.g.</i>, 30% of total deposits or 300% of shareholders' equity) • (5) securitizations up to a ratio over total assets (<i>e.g.</i>, 30–40% of total assets). 					30% of deposits) All other regulatory restrictions in respect of large exposures <i>etc.</i> remain applicable
Permitted Activities	Type of Licence	Deposit Insurance	Capital Regulation	Liquidity Insurance	Prohibited Activities
<ul style="list-style-type: none"> • Issuing of term certificates of deposit and bills, and long-term bonds to the public • Mortgages • Corporate lending • Leasing • Treasury and FX operations • Asset management • Client broking • Limited ability to underwrite securities issues/ take 	Tier II Bank ¹⁰¹	50% of total short-term debt issued to savers Pre-funded co-insurance Scheme	Basle II (as revised) No additional leverage ratios No global levy	Lender of last resort (inevitably at subsidized rates) but pre-funded scheme	No under-writing of securities or proprietary trading exceeding a ratio over (<i>e.g.</i> , 300%) share-holders' equity. Balance sheet securitization not exceeding a set ratio (<i>e.g.</i> , 60%) of total assets No current account deposits All other regulatory restrictions in respect of large exposures <i>etc.</i>

¹⁰¹ It is reasonable to assume that the introduction of a system similar to the above would prompt German universal banks, big UK high street banks, and most of the US mega-banks to be licensed as tier II banks.

proprietary positions in the capital markets <i>Funding basis</i> (1) term savings accounts and certificates of deposit, and structured deposits (no current accounts) (2) short-term bills and long-term bonds issued to public savers and the wholesale capital markets (3) Shareholders' equity (4) Wholesale banking markets: up to 100% of shareholders' equity and long-term debt (5) Securitizations up to a ratio over total assets (<i>e.g.</i> , up to 60% of total assets)					remain applicable
Permitted Activities	Type of Licence	Deposit Insurance	Capital Regulation	Liquidity Insurance	Prohibited Activities
<ul style="list-style-type: none"> • Full range of capital market activities including: underwriting of securities issues • Trading (proprietary) in derivatives • Trading (proprietary) in securities • Underwriting • Broking 	Tier III Firm INVESTMENT BANK, OR INVESTMENT (SECURITIES) FIRM	None	Basle II (as revised)	Liquidity insurance from central bank or private provider at market rates	No deposit-taking No short-term debt issued to the public

<i>Funding basis</i> (1) Shares or bonds that may be offered to the public under the applicable public offer of securities regime or issued to the wholesale capital markets (2) Wholesale banking markets (no restriction) (3) Securitization of assets (no restriction)					
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Cross-shareholdings between the institutions of each tier should not exceed 20%. These restrictions would ensure that systemic risk does not return to the savings and loans industry by virtue of substantial cross-shareholdings (ownership participations).

5.3 The Advantages of Separation

In the absence of a detailed analysis, it is very difficult to say whether the benefits of separation discussed above would surpass the costs that separation would entail. These costs relate to the massive expenses that financial institutions' corporate and business restructuring and asset and business partition would require and the inefficiencies that position limits would create. Yet certain benefits of separation are very clear to any impartial observer.

First, separation would result in smaller banks that would be less systemically important. Also tier I and tier II banks in the above model would be able to take much less debt and would be subject to restrictions regarding their ability to securitize assets, thus

limiting their ability to over-leverage their balance sheet. In addition, activity and position limits would result in much less interconnectedness, since tier I and tier II banks, covered by the government guarantee, would be much less exposed to the eventual failure of a tier III bank in the mould of Bear Stearns or Lehman Brothers or of speculative hedge funds. The systemic stability benefits of such restructuring/reengineering of the financial system could be enormous. In addition, this type of bank separation leads to a significantly diversified banking sector in terms of both assets and liabilities (funding base), containing the destabilizing effects of homogenization.

Second, the suggested separation model allows for different types of risk to flow freely into the system and be managed by specialized institutions that are better able to handle each type of risk.¹⁰² This approach is assumed to be the best way to manage systemic risk.¹⁰³ More importantly, credit risk returns to bank balance sheets, where it belongs and can be managed best by middle-ranking commercial bank managers. It also allows for the rebuilding of client–customer relationships within the commercial banking sector, which are the best system of client monitoring and credit control. The need to return to a more relationship-oriented instead of a transactions-orientated system as an essential requirement for improving the functioning of the financial system has been stressed by leading experts.¹⁰⁴

¹⁰² Persaud notes: ‘The three broad financial risks are: credit risk, liquidity risk, and, market risk. These risks are very different. Moreover, the potential spillover risks of someone holding an asset depends as much on who is holding it as the nature of the asset. Different holders have different capacities for different risks . . . Capacity for a certain type of risk is best assessed by considering how that risk is hedged . . . Credit risk – the risk that someone holding your money defaults – is not hedged by having more time for the default to happen but through offsetting credit risks. Banks with their closeness and access to a wide range of credits have a far greater capacity to hedge credit risks than most’. See Persaud, *supra* note 91.

¹⁰³ *Ibid.*

¹⁰⁴ See Willelm Buiter, ‘Lessons from the Global Financial Crisis for Regulators and Supervisors’, 13 June 2009, available at <http://www.nber.org/~wbuiter/asp.pdf>

Arguably, the only way to achieve such a return is through the reduction of the size of the mega-banks.

Third, the economic benefits of a more stable financial sector would also be considerable. Separation would result in smaller banks and bank financing would perhaps become tighter as banks became better credit risk managers. However, while it has been convincingly argued and empirically tested that access to finance is an essential ingredient of economic growth, there does not seem to be any preference for bank-based funding over market-based funding.¹⁰⁵ Therefore, the size of banks may not be as important as their ability to efficiently offer intermediation services to interested users of finance.

Fourth, separation under the above model would greatly enhance competition and consumer welfare in the financial sector.¹⁰⁶ Breaking up financial conglomerates would mean more competition because of lower barriers to entry. A weakened domestic financial services lobby would be less able to restrict the arrival of foreign banks. Admittedly, foreign entry into domestic banking markets also enhances bank stability.¹⁰⁷ In addition, creating banks that specialize in certain areas of household and business lending might mean better services for customers and fewer conflicts of interest. Conflicts of interest are an issue that dominates universal bank activity and taints the reputation of the financial services industry. Also, better

¹⁰⁵ T Beck, A Demirguc-Kunt, R Levine and V Maksimovic, 'Financial Structure and Economic Development: Firm, Industry, and Country Evidence', World Bank Policy Research Working Paper 2423, June 2000; RG Rajan and L Zingales, 'Financial Systems, Industrial Structure, and Growth' (2001) 17 *Oxford Review of Economic Policy* 467.

¹⁰⁶ As Allan Greenspan has observed: 'So I mean, radical things, as you -- you know, break them up, you know. In 1911, we broke up Standard Oil. So what happened? The individual parts became more valuable than the whole. Maybe that's what we need.' Greenspan, *supra* note ,

¹⁰⁷ Barth, Caprio and Levine, *supra* note 31, 34-35. Barth, Caprio, and Levine conclude that '[c]ountries that do not impose severe limits on foreign bank entry enjoy greater banking-sector stability.' *Id.* 38.

client service builds stronger corporate reputations and adds value to the bank's franchise. Moreover, smaller and more specialized banks would become better managed, as profits and the 'bonus pool' would come back down to earth, excessive remuneration packages would become very rare and play very little role in the running of those smaller banks. This would also stop the futile search to find individuals with super-human skills to run banking sector business.¹⁰⁸ Finally, as smaller banks would inevitably post smaller profits, separation would also provide a more effective solution to excessive compensation than direct compensation regulations.

Fifth, the above model of separation targets the reinforcement of market discipline incentives, recognizing its relative importance. It leaves less room for safe speculation by free-riding on the government guarantee. Furthermore, the public would know that placing their savings with tier II banks would mean only limited safety, since such savings would be insured only up to 50% of total value. In addition, counterparties of tier II and tier III banks would not be able to assume that any of those institutions was too-big-to-fail, since public guarantees would be partly or totally withdrawn.

Sixth, while objections may be raised regarding the cost of capital and market efficiency in respect of separation, it was shown, in section 4.2 above, the most potent alternative system, namely capital and leverage regulations, is also expensive and has a substantial impact on the costs of capital to users. Furthermore, global investment banks do not really provide capital to corporate issuers, they just act as intermediaries, and they would maintain that role. In the case of tier II (ex universal) banks, what has so far been done internally, would be done on the basis of external contracting, raising transaction costs slightly. For instance, in the case of underwriting they would need to borrow funds at a

¹⁰⁸ John Kay, 'Our Banks are beyond the Control of mere Mortals', *Financial Times*, 8 July 2009, 11.

market rate, instead of free-riding on the low cost of funding ensured by their big deposits base.

Seventh, the suggested separation model would substantially strengthen the stability of individual institutions. While tier I deposit-taking banks would operate under the strictest regulatory framework and within the deposit guarantee scheme, riskier tier II banks would not be able to offer on demand deposits, reducing the possibility of a bank run. In addition, while the securitization of bank assets may lessen the strength of the bank balance sheet, restricting this activity would offer creditors a higher degree of comfort, facilitating bank access to the inter-bank loan market. A classic example here is the case of Northern Rock whose securitized loans, almost half of the best mortgages in its lending book, had been passed to an offshore Trust called the Granite Fund. This meant that Northern Rock was hit harder than other banks and has created serious concerns that the British taxpayer may not fully recover the sums lent to and invested in Northern Rock.¹⁰⁹

Eighth, the model suggested above is possibly the only form of bank separation that could prove politically palatable within the G20. While a Glass–Steagall type dichotomy would mean devastation for the European banking industry, a three-tier model would leave European banks ample room to restructure their different business lines and readjust their business models and sources of funding without having to shut down entire business units. Arguably, as most European and US banks would opt for a tier II licence, they would lose the competitive advantage ensured by a cheap competitive base. This would mean that the banks would have to be run much more efficiently than they presently are and offer better returns to

¹⁰⁹ See P Webster, G Hurst and S Kennedy, “Northern Rock Nationalisation Runs into £49bn Granite Barrier”, *The Times*, 21 February 2008, available at <http://www.timesonline.co.uk/tol/news/politics/article3406368.ece>

their depositors. It is not hard to see the welfare gains that such development would entail for the banking industry and western savers.

Finally, the model remains neutral regarding the nature of the competent regulatory authority supervising the new institutions, thus minimizing the disturbance to the existing regulatory structures within the G20 countries.

6. CONCLUSION

The risks created by the domination of the global financial services industry by ‘too-big-to-fail’ banks have taken centre stage in the regulatory reform debate. Influential voices have been raised arguing for a return to some type of separation of ‘casino’ banking from ‘utility’ banking. However, since such a separation would be very expensive those voices went unheeded for a long time.

The surprise announcement of the ‘Volcker Rule’ by President Obama has, however, totally changed the scene. In this context, this paper has argued that separation is overall a better and more effective policy measure than other alternatives in countering the ‘too-big-to-fail’ institution problem. The paper has submitted to discussion a flexible and workable three-tier model for the licensing of banks based on a differentiation of the various forms of banking business (depending on the risks of each activity) and position limits. The suggested model could ensure that the result of any separation exercise is a safer banking system that also facilitates growth by safeguarding the smooth flow of credit to the economy.

The present proposal could become the basis of further discussion regarding the identification of the appropriate model for bank business separation. The central idea of this paper is that any future model for the separation of ‘casino’ from ‘utility’ banking should be based on international consensus. Therefore, it must be sufficiently flexible to accommodate

the pluralism of banking business activity around the world. Implementation of such a separation model could protect against the nightmare scenario where most major jurisdictions require separately structured and capitalized subsidiaries, organized and operating according to their own prudential regulation standards. This is exactly the situation where European rejection of the unilaterally declared 'Volcker Rule' could lead to, resulting in a loss of organizational and funding efficiencies for international financial groups and considerable market fragmentation.

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