PART Ine **Financial Architecture** B

P1: TIX/b P2: c/d QC: e/f T1: g c01 JWBT397-Acharya September 30, 2010 12:32 Printer: Courier Westford

CHAPTER

The Architecture of Financial Regulation

Thomas Cooley and Ingo Walter*

There are four pillars of effective regulatory architecture that are common across all financial systems. Good architecture should (1) encourage innovation and efficiency, (2) provide transparency, (3) ensure safety and soundness, and (4) promote competitiveness in global markets. Efforts to pursue these objectives at the same time inevitably create difficult policy trade-offs. Measures that assure greater financial robustness may make financial intermediation less efficient or innovative, for example. Efforts to promote financial innovation may erode transparency, safety, and soundness. Competitive pressure among financial centers may trigger a race to the bottom in terms of systemic robustness to internal and external shocks.

Unfortunately, benchmarks underlying the financial architecture, on which it is easy to find agreement, are far more difficult to define in detail and even more difficult to calibrate in practice. We know that excessive regulation involves costs, but what are they? We also know that underregulation can unleash disaster, which can be observed only after the fact. So optimum regulation is the art of balancing the immeasurable against the unknowable. It is not surprising that financial crises are a recurrent phenomenon.

In this chapter we spell out the practical alternatives for financial regulation and identify the nature of their impact on key attributes of financial products, markets, and firms. We then narrow the range of regulatory options to those contained in the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 and comparable regulatory initiatives around

^{*}The authors benefited from discussions in "The Architecture of Financial Regulation" Working Group for the NYU Stern e-book *Real Time Solutions for Financial Reform*, which also included Lawrence J. White.

the world, and assess them in light of the four pillars of regulatory architecture underlying a financial system that successfully serves the public interest.

1.1 WALKING THE REGULATORY TIGHTROPE

The Prologue to this volume makes clear that financial intermediation is an essential economic activity that is fraught with difficulties. There are frequent market failures involving asymmetric information, costly state verification, and missing markets. Even in the simpler world of the early twentieth century, such problems brought the financial system to its knees repeatedly until a more robust regulatory structure—one that somehow managed to work tolerably well for a long time—was designed in the 1930s. Over the ensuing decades that structure was altered to accommodate new institutions, new financial instruments, financial globalization, and periodic shocks and market failures. Over time it began to resemble a structure that had been modified too many times and in too many ways to efficiently accommodate the growing complexities of modern financial intermediation. Eventually it reached a tipping point and failed spectacularly, with huge costs to the global economy.

Although the worst of the financial crisis of 2007 to 2009 has passed, the defects of the dominant institutions remain. They continue to pose grave risks to future financial stability. So a new regulatory architecture has become inevitable, and it is important to consider how it will perform.

Regulatory architecture is critical to resource allocation and economic growth. Economies with inefficient financial systems demonstrably waste more economic resources and grow more slowly than otherwise comparable economies with efficient financial systems. Economies with weak financial systems continue to plug into global financial markets in search of low-cost capital, so they are no longer immune to global shocks and sometimes contaminate the system with shocks of their own. Good financial architecture has to be robust to shocks that emanate from the financial system and the real economy both domestically and internationally.

Adding yet another layer of complexity are the institutions charged with executing regulatory mandates affecting the financial architecture. Should regulators be organized by function—such as commercial banking, investment banking and financial markets, asset management, and insurance—allowing them to gain enough industry expertise to have a reasonable understanding of what it is they are regulating? Or should they be structured in line with the firms they are regulating, ranging from financial

conglomerates to community banks, so they can better oversee the complexities and avoid overinvestment in regulatory infrastructure where it isn't needed?

And who should monitor the buildup of systemic risk in the financial structure as a whole (macro-prudential risk), which goes well beyond the remit of regulators covering individual firms (micro-prudential risk)? This in turn raises the question of who gets to determine when firms have failed, and how to resolve them if they are no longer viable? And should those doing the resolving be the same people who created the failure or stood by and watched it happen in the first place?

In great architecture, "form follows function." Financial architecture is really no different. The institutional structure that should be created to implement the regulatory changes that have now been passed into law in the United States depends critically on certain macro decisions about the goals of the regulation. If some activities are carved out of financial conglomerates into independent financial specialists, for example, a sensible regulatory architecture may be very different from what would be needed if financial conglomerates are left intact, with all of their internal complexity, conflicts of interest, and opaqueness.

Finally, there is the critical issue of regulatory execution, which is almost always done by high-minded and overworked civil servants standing against the best and the brightest on the payrolls of those they are supposed to be regulating. Plenty of examples attest to the inequality of this battle, with well-intentioned regulation undermined by regulatory arbitrage that distorts its purpose and implementation.

There are many regulatory issues at stake. How do we protect consumers? What should we do about corporate pay? What should we do about mortgages? How should we regulate derivatives? And so on. All are important to someone, but there is one issue that is important to all: How do we construct a system of regulation in which decisions made in one or a few financial institutions cannot bring the entire system to a halt and the world's economies to their knees? This is the problem of containing systemic risk. Without question it is the single most important issue.

The U.S. Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 and the discussions being held elsewhere in the G-20 countries are at least in part a reflection of popular sentiment—notably a powerful emotional antipathy toward bankers—lobbying by special interests, and substantial political trade-offs and maneuvering. But that is the history of both our financial system and financial regulation. Here our goal is to offer informed commentary on the new structures for financial regulation that are on the table, and an idea of what might be done better. Since regulation and government intervention are an explicit acknowledgment of market failure, there is an inherent acceptance of the cliché that we should not let the perfect be the enemy of the good.

The regulatory dialectic in the financial services sector is both sophisticated and complex, and it often confronts heavily entrenched and politically well-connected players—and runs up against the personal financial interests of some of the brightest minds and biggest egos in business. The more complex the industry, the greater the challenge to sensible regulation, probably nowhere as strikingly as in the case of massive, complex, global financial services conglomerates that may be too hard to manage, too hard to oversee and govern, and almost certainly too hard to monitor and regulate.

To preview our line of thinking, we believe that by far the best way to address the most important issue of all—systemic risk—is to make the firms that create it pay a fair price for having created it. This requires measuring, pricing, and taxing systemic risk, as discussed in detail in Chapters 4 and 5 of this book. The only alternative is to require institutions that manufacture systemic risk to become simpler by separating their excessively risky activities into independent firms, as discuss in Chapter 7.

Whether derisking the financial system by correctly pricing systemic risk or by segregating highly risky functions into nonsystemic firms, a powerful regulatory capability is essential. The financial crisis of 2007 to 2009 has highlighted the failure of other approaches—such as managerial selfregulation, proper corporate governance, industry self-regulation, and market discipline—to successfully contain systemic risk. It is far too late for the financial industry to argue that lessons have been learned that ensure that firm-level and system-level risk management will work better next time.

1.2 ALTERNATIVE APPROACHES TO FINANCIAL REGULATION

The new regulatory architecture embodied in the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 is a complicated brew—one that changes much but does so without an overarching and coherent structural design. Indeed, it deals only partially with one of the most striking and dangerous aspects of international finance that has developed over the past decade or two, namely the growth of the shadow banking system. These are firms or business units of financial conglomerates that perform key functions of banks but to a significant degree fall outside the regulatory system. They include hedge funds, private equity funds, mutual funds, derivatives, and repo markets that incur market risk, credit risk, liquidity risk, and operational risk. Like water channeling its way to the sea, financial flows seek the

least costly and least regulated bypasses, mostly through the shadow banking system. So unless the regulatory architecture encompasses these flows, it is doomed eventually to fail.

Starting with the end of the 2007 to 2009 global financial crisis and taking on board the valuable lessons learned, we can identify four alternative routes to improve the financial architecture in terms of satisfying the criteria we have in mind: encouraging innovation and efficiency, providing transparency, ensuring safety and soundness, and promoting competitiveness in global markets.

Modified Laissez-Faire

The first option essentially involves maintaining the institutional status quo—the Gramm-Leach-Bliley rules permitting financial conglomerates in the United States and universal banking rules in other countries—and allowing banks or bank holding companies to engage in all forms of financial intermediation and principal investing worldwide, subject to certain firewalls and other safeguards. These safeguards would be modified to deal with systemic risk and incorporate the lessons of the financial crisis of 2007 to 2009. This option is heavily favored by the major financial firms in the United States, and major regulators elsewhere have recommitted themselves to the universal banking or financial conglomerate model. Despite much evidence to the contrary, they believe that bigger and broader are better.

Laissez-faire was the initial approach of the Obama administration, which in March 2009 announced a package of proposed regulatory reforms and new measures to deal with systemic risk. These principles are to a large extent reflected in the Dodd-Frank Act. The success of this approach depends critically on the government's ability to install and enforce an effective set of rules through a constellation of new or reinvigorated regulatory agencies covering a wide variety of different types of financial institutions in both the banking and the shadow banking worlds. With much financial intermediation having moved to the shadow banking sector and falling outside of the purview of the existing regulatory agencies, the consequence is a loss of transparency and a huge increase in the informational asymmetries in markets. So getting the regulatory architecture right poses an enormous challenge, given that the regulators themselves have had a dismal record of preventing crises through the enforcement of rules in the existing regulatory structure.

The key elements of a modified laissez-faire approach—one that would improve the safety and soundness of all financial intermediaries—involves (1) creating an appropriate mandate and tools for a systemic risk regulator, (2) pricing implicit public subsidies to systemic financial firms using capital and liquidity requirements, (3) improving the transparency of the financial system, and (4) creating the bankruptcy tools the financial system needs.

The 1930s U.S. financial reforms were truly revolutionary in their time, and in many ways visionary. The modified laissez-faire approach of today is more incremental. It mainly patches holes in a failed system and establishes early warning and corrective action, which would hopefully catch the next big crisis in time to prevent systemwide damage.

Could this modified laissez-faire approach succeed? Much depends on how well the new systemic risk regulator—the Federal Reserve—is able to do its job. Is it really likely that systemic institutions that have shown themselves to be too big and complex to manage and too big, complex, and interconnected to regulate by the past regulatory structure will in the end be rendered fail-safe under the evolutionary new regime?

There is also the issue of regulatory capture. The ease with which the investment banking industry was able to convince the Securities and Exchange Commission (SEC) to allow an increase in its leverage ratios in 2004, or the banking industry was able to capture the Federal Deposit Insurance Corporation (FDIC) politically and get in place limits on FDIC insurance contributions, or the commercial banking industry was able to undermine hard-fought progress on fair value accounting and permit banks to manipulate earnings in 2009 does not augur well for future regulatory capture. Nor does the 2010 report of the Lehman Brothers bankruptcy examiner regarding the firm's ability to collectively bamboozle regulators, auditors, rating agencies, lawyers, and investors by slipping through the cracks in the system—for example, by creatively using repo transactions. It will not be the last time. Much talent in the years ahead will be devoted to avoidance, evasion, obfuscation, and financial innovation with little or no commercial or social purpose.

Critics of the Federal Reserve as the lead regulator of systemic financial firms have argued that its track record in the run-up to the most recent crisis proved to be very poor indeed. Together with the U.S. Treasury, its damagecontrol efforts in the crisis broke all precedents and increased the amount of moral hazard and competitive concentration in the financial system. It was not necessarily worse than the combined efforts of the Bank of England and the Financial Services Authority in the United Kingdom, or the European Central Bank (which does not have a direct regulatory mandate) and the gaggle of national regulators in continental Europe. Like the United States, it's back to the drawing board for the regulatory architecture in major financial systems around the world.

Excessive pessimism is certainly premature, but the Fed's increased politicization is a virtual certainty going forward, as its mandate extends further from monetary policy into politically sensitive macro-prudential

and micro-prudential domains. So it is surely a design weakness of the laissez-faire approach if it permits monetary policy to be distorted by these new mandates.

However, successful pricing of systemic risk using a combination of capital and liquidity requirements, along with the cost of more intense supervision, holds considerable promise. These are aforementioned taxes that are intended to internalize the negative externalities created by firms that produce systemic risk. Ultimately, their success will depend on how effectively they reflect the systemic risk of the financial institutions subject to them, and how these requirements are extended into the shadow banking system. If boards and managements are doing their jobs, they will carefully reexamine the costs and benefits of remaining massive financial conglomerates, for example, and find ways of escaping into less heavily taxed nonsystemic organizational forms.

Glass-Steagall 2.0

The argument for reinstating Glass-Steagall-like bank activity restrictions is that certain profitable but volatile activities of investment banks and other parts of the shadow banking system are incompatible with the special character of commercial banking—namely, operating the payments system, taking deposits and making commercial loans, and serving as the transmission belt for monetary policy. These activities include underwriting and dealing in corporate debt and equities, asset-backed debt and certain other securities, derivatives of such securities as credit default swaps, principal investing, and managing in-house hedge funds. These activities are also deemed to be incompatible with access to Federal Reserve discount facilities, debt guarantees, and other types of government support intended to safeguard the public-utility attributes of commercial banking.

Under this regulatory option, the legacy investment banks that converted to bank holding companies during the crisis in order to gain full access to the government safety net (Goldman Sachs and Morgan Stanley) would revert to broker-dealer status and would be functionally regulated as such, with additional oversight by the systemic risk regulator. The investment banking divisions of commercial banks would be sold, floated, or spun off to shareholders and similarly regulated. U.S. investment banking divisions of foreign financial conglomerates would be divested as well, or operate as separately capitalized subsidiaries of their foreign-based financial conglomerate parents.

Some have suggested that the Glass-Steagall constraints of 1933 may in fact have performed relatively well for over half a century, when benchmarked against all four of the criteria noted earlier—efficiency, innovation, robustness, and competitiveness. The epic battle between bank-based and capital-market-based finance, domestically and internationally, created competitive pressure for all financial intermediaries. The U.S. financial system was stable and prosperous in spite of many shocks and changing monetary standards during the 66 years Glass-Steagall was in effect.

An alternative view is that the U.S. financial system prospered *in spite of* the restrictions imposed by Glass-Steagall because of the country's uniquely powerful economic position in the aftermath of World War II. During this period, New York became the leading global center of finance, with London as its only serious rival. All of the continental financial centers, dominated as they were by universal banks, dropped by the wayside as their own investment banking units joined their chief global wholesale rivals in London and New York. Many investment banks gravitated to an integrated full-service business model and thrived without access to central bank liquidity facilities or public bailouts in the case of failures like Barings in London or Peregrine Securities in Hong Kong. The same was true of buy-side specialists in the mutual fund business (e.g., Fidelity and Vanguard), pension funds (e.g., TIAA-CREF in the United States and Hermes in the United Kingdom), and hedge funds (e.g., Soros and Tiger).

The survival and even prosperity of financial specialists in the presence of government-supported and -subsidized bank holding companies suggests that a modern version of Glass-Steagall would not turn out to be ruinous. Mergers and acquisitions (M&A) boutiques ranging from Perella Weinberg to Lazard Frères seem to be thriving on the basis of dispassionate corporate advice, as are midsize investment banks like Jefferies & Company, which do a viable midmarket business and make a point forgoing government support, as opposed to their conglomerate rivals.

This is anecdotal evidence, of course, but it suggests that a powerful nonbank financial intermediation industry would quickly emerge following Glass-Steagall-type reregulation, one populated by more transparent firms that lend themselves to relatively straightforward oversight by functional regulators in tandem with a systemic risk regulator.

Functional Carve-Outs, Size Constraints, and the Volcker Rule

A less draconian approach to limiting the scope of banking activity, as Glass-Steagall did, is to recognize that some financial activities should not be allowed within systemic multifunctional firms. Among these activities are:

- Management of in-house hedge funds.
- Creating off-balance-sheet affiliates having no commercial purpose and dedicated to evading regulatory constraints.

- Running large proprietary trading positions in cash securities and derivatives that are not integral to the core process for financial intermediation.
- Acting as principal investors in nonfinancial activities such as real estate and private equity.

Financial conglomerates persistently argue that such carve-outs would limit synergies that are essential to their business models. But it is not clear that those synergies actually exist to the extent claimed, or if they do, whether they are in the public interest.

An alternative or complement to carve-outs is to limit the size of financial conglomerates that incorporate commercial banking units, so that they are forced to become nonsystemic. Metrics to achieve this could include market share caps or deposit ceilings or asset ceilings. This would not involve activity prohibitions, but size-constrained financial conglomerates would soon lose critical mass in specific areas of engagement, and presumably would try to focus on the most profitable ones and divest others. This could be a more market-aligned and elegant solution than specific activity carve-outs.

Given murky evidence so far on the relationships between firm size and efficiency, stability, and competitiveness, size constraints may have some merit. Paradoxically, the general response of policymakers to the crisis thus far (except for Lehman Brothers) is to make financial Goliaths even bigger and even more systemic.

Global Alignment

One of the continuing themes in the discussions of financial regulation is the problem of global alignment versus fragmentation. Even supporters of the modified laissez-faire approach, discussed earlier, are concerned with global coordination and in particular with avoiding competitive distortions that would impede the continued globalization of finance.¹ The premise is that global mobility of capital has contributed significantly to world economic growth.

Observers point to the fact that national governments such as the United Kingdom, Switzerland, Japan, France, and the United States ultimately support the safety net covering financial conglomerates and other systemic firms based in their jurisdictions. In the case of large international firms based in small countries, the spillover from the systemic risk of institutional failure to sovereign risk is obvious. Compared to the United States, such countries therefore have an even greater incentive to implement serious safety and soundness policies for their financial firms, and then let the firms decide whether they should change their business models to avoid the costs. This incentive also suggests that most of the world's home countries of systemic financial firms would have a great interest in harmonization and coordination to make it all work.

Skeptics argue that most countries are so wedded to the universal banking model that they are unlikely to go along with any tougher regulatory architecture that may result in structural changes in financial conglomerates. Moreover, the decades it took to achieve the Basel Accords on capital adequacy and the ease with which they were evaded does not augur well for effective globally coordinated regulatory reforms. Indeed, the Basel Accords are the poster child for the failures of regulatory coordination. Basel III Accords are now under discussion, but most sovereign regulatory bodies recognize what a disaster Basel II was. This means it will take a long time to agree on regulations, and countries like the United States are unlikely to be bound by them.

An alternative is to force global systemic institutions to run their nondomestic financial operations as separately incorporated subsidiaries of the parent firm and regulated principally by the host countries where they do business. Host regulators, it is argued, are closer to the action and ultimately would have to carry the safety net, in effect ring-fencing local operations from support obligations on the part of the taxpayers of the parent firms' home countries. Understandably, this argument has been received most enthusiastically in small countries like Switzerland that are home to big, global, and systemically significant financial firms.

Like protectionism in international trade, the costs of regulatory fragmentation could be enormous, although these costs are often broadly dispersed and hard to measure. In the past, banks in many countries were protected from competition by entry restrictions and direct controls, in return for which they accepted the domestic regulations that were imposed on them. In today's global economy that is no longer feasible, and banks' ability to operate across national jurisdictions helps them to avoid regulations.

But that hardly means that countries have a built-in incentive to create porous regulatory environments. The United States and the United Kingdom, for example, have no reason to participate in a regulatory race to the bottom even if they pursue different approaches to regulation. Despite their recent problems, New York and London remain the two major financial centers in the world. Why? The answer is simple: good institutions, good legal systems, and a commitment to good regulation. Both will continue to be places where those with weaker institutions will want to do business, if only because the cost of capital is lower.



We conclude that, all things considered, given the facts on the ground, the most defensible approach to the new regulatory architecture in

finance—assuming it can be carried out in a disciplined, consistent, internationally coordinated, and sustained manner with a firm eye to the public interest—is the first of these alternatives: modified laissez-faire.

By creating and enforcing a shadow price for systemic risk, universal banks and financial conglomerates will draw their own strategic conclusions in the context of the microeconomics and industrial organization of global wholesale financial intermediation. The hope is they will split themselves up into smaller, less systemic, more specialized, easier-to-regulate firms. Shareholders themselves can then decide what kinds of financial firms they want to own based on risk and return criteria, rather than being forced to own a fixed portfolio of businesses in the form of shares in financial conglomerates. Financial theory and empirical evidence suggest they will be better off as a result.²

But those who have become incurably cynical about politics and regulatory capture might think about advocating specific activity carve-outs (Option 3) as a second-best alternative, specifically as proposed under the original Volcker Rule. Either option stands some chance of forestalling another financial crisis—at least in the short run. If Option 1 turns out to fail this time, then Option 2 will surely be considered seriously after the next big financial debacle.

1.3 THE LEGISLATION

Based on the criteria that we have suggested ought to set the basis for reform of the financial architecture and the options that exist to meet those criteria, how does the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 measure up?

Taken as a whole, the legislation does not incorporate a clear or consistent approach to the problem of regulating the financial sector. It incorporates elements from all four of the foregoing approaches, but mainly a great deal of modified laissez-faire plus a few restrictions on banks' activities. Perhaps its greatest failure is that it is not anchored in a serious consideration of the question of what is banking and what is a bank. As a result, it has no clear and coherent set of policies for dealing with the shadow banking system and bringing it under the regulatory umbrella in a systematic way. Indeed, the architectural compromises incorporated into the Act have resulted in a rather unwieldy structure.

A committee of regulators, the Financial Stability Oversight Council, is made responsible for monitoring systemic risk and taking measures to address it. The Federal Reserve is given a greatly expanded role in the supervision and regulation of systemic firms, including nonbanks, but the Fed's own powers to intervene in a crisis and to come to aid of the shadow banking system are constrained—as we discuss in the next chapter. It is hard to imagine a more complex and politicized task.

The Act requires that all bank holding companies with total consolidated assets of at least \$50 billion, along with nonbank financial companies designated by the Council as systemically significant, will potentially be subject to heightened prudential standards promulgated and administered by the Fed. While the \$50 billion threshold for bank holding companies is significant, the Fed retains important flexibility to distinguish between bank holding companies on the basis of their perceived riskiness, complexity, activities, size, and other factors in terms of which financial firms will be subject to stiffer prudential standards.

The Act does not set specific prudential requirements, but it identifies areas where the Council can recommend higher prudential standards and where the Fed must impose them. These stiffer standards include heightened capital requirements, rigorous leverage and liquidity requirements, risk management requirements, concentration limits (25 percent of capital stock and surplus), resolution plans (so-called living wills), and stress tests. Certain publicly traded companies supervised by the Fed will be required to establish independent risk committees.

Another significant feature of the legislation is that the Fed will be required to impose a strict 15:1 debt-to-equity leverage ratio on any financial company that the Council determines poses a "grave threat" to financial stability. The Fed will also be required to create an early remediation regime—similar in concept to the prompt corrective action (PCA) regime of the FDIC—in consultation with the Council and the FDIC.

The Fed will also have discretion to impose other prudential standards, including contingent capital requirements, enhanced public disclosure, short-term debt limits, and other measures the regulators decide are necessary to mitigate risk. The Act leaves open the possibility that the Fed may decide to require nonbank financial companies to segregate their financial activities into separate entities.

With respect to capital standards, the Act does take pains to avoid the Basel II trap. The Collins Amendment requires that the risk-based and leverage capital standards currently applicable to U.S. insured depository institutions be imposed on U.S. bank holding companies, including U.S. intermediate holding companies of foreign banking organizations, thrift holding companies, and systemically important nonbank financial companies. It requires that whatever capital and leverage standards are arrived at eventually will constitute a floor with respect to any future Basel III Accords.

The legislation shied away from size and line-of-business restrictions or activity carve-outs. Instead it envisions that the aforementioned, enhanced

risk limitations can be successfully imposed and enforced by the Fed and the Council. The Act does not prevent the largest financial companies from growth by acquisition, but no financial company will be permitted to merge with another financial company if the consolidated liabilities of the combined firm exceed 10 percent of the total consolidated liabilities of all U.S. financial companies.

Large banks and other systemically important financial firms are otherwise left to function as they did before, although they will be being monitored more intensely and be subject to a variety of new nonsystemic regulatory constraints (consumer protection, derivatives trading, executive compensation, etc.).

The Act gives the Federal Reserve the authority to intervene in any systemically important financial company for the purpose of affecting liquidation, subject to a two-thirds vote of the Council of Regulators, provided that no government funds are used for any sort of creditor bailout without prior congressional approval. The bill includes a new orderly liquidation authority (OLA) that will replace the bankruptcy code and other applicable insolvency laws for liquidating financial companies and certain of their subsidiaries under certain circumstances. Under the new liquidation authority, the Treasury secretary would have the authority to appoint the FDIC as receiver of any financial company if certain conditions are satisfied.

A requirement for a dissolution insurance fund to be financed by annual premiums paid by systemically important firms was the focus of intense Republican opposition, and was ultimately dropped from the legislation. This omission was contrary to the advice of many observers in academia. Such a fund would have reimbursed the government for the too-big-to-fail subsidy of their borrowing costs as a way to set aside funds necessary for any future bailouts. Instead, the costs of remediation are to be borne by surviving firms—firms that turned out to be better managed and less risky. We continue to believe that this makes no sense whatsoever.

The Dodd-Frank Act does implement a much weakened form of the Volcker Rule (subject to further study) by limiting the amount banks may invest in proprietary hedge funds and private equity funds to 3 percent of Tier 1 capital, and prohibits proprietary trading in all but obligations of the U.S. government or its agencies and municipal debt. It also requires systemically important nonbank financial companies to carry additional capital and observe some limits on proprietary trading activities, but it does not expressly prohibit them. The Volcker Rule even in its weakened form is not effective until two years after enactment, and then there will be a two-year transition period with the possibility of additional extensions. Given those conditions, the Volcker Rule seems unlikely

to be binding on the behavior of banks or shadow banks anytime soon, if ever.

A positive note is that the Act does a fair amount to improve the transparency of the financial system. It departs from the anything-goes culture of the past decade. It requires mandatory clearing of derivatives through regulated clearing organizations and mandatory trading through either regulated exchanges or swap execution facilities. It mandates new oversight and monitoring activities in the Fed, the Treasury, and the SEC. It falls short in coming to grips with the informational role played by rating agencies and understanding the key market failure that compromised their role in the past.³

Finally, the Dodd-Frank Act pays little real attention to international regulatory efforts or coordination. Members of Congress and the Obama administration assumed that whatever reforms come about in the United States will be the first to appear, and therefore would inevitably become the template for the world. The main exception is a willingness to be part of the discussion of revised minimum bank capital adequacy standards in the form of Basel III that could be implemented after substantial negotiation over an indeterminate period of time.

The organizational structure of the new regulatory system is unwieldy for sure. The Federal Reserve is at the center of it with greatly expanded responsibilities and some new powers to go with them. Equally, the Treasury and the FDIC have newly articulated roles in preserving financial safety and soundness and ending the too-big-to-fail problem and the inherent moral hazard that goes with it. Finally, the SEC has a greatly expanded mandate for rule making, monitoring, and ensuring transparency.

One of the glaring oversights of this new architecture, however, is that it doesn't pay enough attention to the financial needs of the regulators and, as a result, it preserves a strong political role in the regulatory process. The Federal Reserve will maintain its independence and is self-funded. But it is subject to stronger oversight than ever and less independence of action. The new Bureau of Consumer Financial Protection is independently funded by the Fed. The FDIC's independence seems to be even more limited than in the past because it has greatly expanded authority for resolving insolvent bank and nonbank firms but no authority to charge insurance premiums ex ante. Its ability to assess fees based on the risks it insures has always been limited by Congress and will continue to be so. It must now borrow from the Treasury to cover the costs of resolving insolvent large, complex financial institutions (LCFIs). The SEC has greatly expanded responsibilities, but, as in the past, no ability to fund itself. It will remain subject to the whims of congressional appropriations and thus vulnerable to political capture.

1.4 SUMMARY

As a general proposition, financial intermediaries and the structure of the financial architecture cannot be allowed to impose politically unacceptable costs on society, either by failing individuals deemed worthy of protection in financial matters or by permitting firm-level failure to contaminate other financial institutions and, ultimately, the system as a whole.

Protecting the financial system from misconduct and instability is fundamentally in the public interest. It inevitably presents policymakers with difficult choices between financial efficiency and innovation on the one hand and institutional and systemic safety and stability on the other. And because the services provided by banks and other financial intermediaries as allocators of capital affect nearly everything else in the economy, regulatory failure quickly becomes a traumatic event with important consequences for the real sector of the economy.

There is much still to be determined about the new shape of financial regulation. A great deal depends on rules yet to be written and decisions yet to be made in the process of implementing the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010. We suggest that correct pricing of systemic risk and successfully forcing the costs inside financial intermediaries is the first and best option for performing well against the four key criteria for financial architecture we have proposed. Financial intermediaries can then select strategic options that reduce net regulatory burdens, in the process reducing society's exposure to systemic risk.

NOTES

- 1. See, for example, Committee on Capital Markets Regulation (2006) and McKinsey & Co. (2008).
- 2. See, for example, Schmid and Walter (2009).
- 3. See Chapter 15 of this book.

REFERENCES

- Acharya, Viral, and Matthew Richardson, eds. 2009. *Restoring financial stability*. Hoboken, NJ: John Wiley & Sons.
- Bodnar, Gordan M., Charles Tang, and Joseph Weintrop. 1999. Both sides of corporate diversification: The value impacts of geographic and industrial diversification. Working paper, Johns Hopkins University.
- Campa, Jose M., and Simi Kedia. 2002. Explaining the diversification discount. Journal of Finance 57:1731–1762.

- Committee on Capital Markets Regulation. 2006. Interim report of the Committee on Capital Markets Regulation (The Paulson Report). Washington, DC: U.S. Government Printing Office.
- DeLong, Gayle. 2001a. Focusing versus diversifying bank mergers: Analysis of market reaction and long-term performance. Working paper, CUNY.
- DeLong, Gayle. 2001b. Stockholder gains from focusing versus diversifying bank mergers. *Journal of Financial Economics* 59:221–252.
- Denis, David J., Diane K. Denis, and Keven Yost. 2002. Global diversification, industrial diversification, and firm value. *Journal of Finance* 57:1951–1979.
- Fauver, Larry, Joel F. Houston, and Andy Naranjo. 2004. Cross-country evidence on the value of corporate industrial and international diversification. *Journal of Corporate Finance* 10:729–752.
- Gande, Amar, Manju Puri, Anthony Saunders, and Ingo Walter. 1997. Bank underwriting of debt securities: Modern evidence. *Review of Financial Studies* 10 (4): 1175–1202.
- Houston, Joel, and Michael Ryngaert. 1994. The overall gains from large bank mergers. *Journal of Banking and Finance* 18:1155–1176.
- Kane, Edward J. 1987. Competitive financial reregulation: An international perspective. In *Threats to international financial stability*, ed. R. Portes and A. Swoboda. Cambridge: Cambridge University Press.
- Kane, Edward J. 2001. Relevance and need for international regulatory standards. Brookings-Wharton Papers on Financial Services: 87–115.
- McKinsey & Co. 2008. Sustaining New York's and the US' global financial services leadership. Report commissioned by Mayor Michael Bloomberg and Senator Charles Schumer. Mayor's Office of the City of New York. Available at www.nyc.gov/html/om/pdf/ny_report_final.pdf.
- Puri, Manju. 1996. Commercial banks in investment banking: Conflict of interest or certification role? *Journal of Financial Economics* 40 (3): 373–401.
- Saunders, Anthony, and Ingo Walter, 1994. Universal banking in the United States. New York: Oxford University Press.
- Schmid, Markus M., and Ingo Walter. 2009. Do financial conglomerates create or destroy economic value? *Journal of Financial Intermediation* (October).
- U.S. Department of the Treasury. 2009. Bank regulatory reform: Rebuilding financial supervision and regulation. Washington, DC: U.S. Government Printing Office.

Walter, Ingo, ed. 1986. Deregulating Wall Street. New York: John Wiley & Sons.

Walter, Ingo. 2004. *Mergers and acquisitions in banking and finance*. New York: Oxford University Press.