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Supersize Them? Large Banks, Taxpayers and the Subsidies that Lay Between

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Supersize Them? Large Banks, Taxpayers and the Subsidies that Lay Between

*By Nizan Geslevich Packin**

Abstract: In 2013, media reports sent shockwaves across financial markets by estimating that the value of the combined financial advantages and subsidies for the six biggest U.S. banks since the start of 2009 was at least \$102 billion. Follow-up reports estimated that the profits of two of America's largest banks would have been negative if not for implicit and explicit government subsidies. The most significant implicit subsidy stems from market perception that the government will not allow the biggest banks to fail—that they are “too-big-to-fail” (TBTF)—enabling them to borrow at lower interest rates. This article focuses on two main things. First, it explores the TBTF subsidies and their unintended consequences. Specifically, the article examines whether TBTF subsidies exist, and reviews the different estimates of the arguable subsidies. The article describes why it is difficult to measure the subsidies given the lack of any formal or transparent data, and discusses the perverse effects and incentives that result from the subsidies. Second, the article examines the various proposals that have been suggested to address the TBTF problem, and suggests a new user-fee framework that could be useful in addressing the issue and used together with other approaches.

The article's contributions are three-fold. First, it provides a theoretical framework for understanding how government subsidies have worked in the past. Second, the article applies that framework to demonstrate that the current body of work on the issue is incomplete because it under-theorizes the TBTF subsidies' impact on the economy and politics. Finally, the analysis in this article usefully supplements the existing legal writing on regulation of banks. As a first step, the article explains the problems created by the subsidies, and suggests that policymakers and market participants should be more transparent about the subsidies, especially since taxpayers do not have standing to challenge such subsidies. As a second step, the article reviews the advantages and the shortcomings of the suggested solutions to the TBTF problem and suggests using user-fees to help minimize the impact of future financial, social and political crises.

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I. INTRODUCTION

In the aftermath of the 2008 financial crisis, rating agencies,¹ regulators,² global organizations³ and academics⁴ made the argument that the largest banks continue to receive great competitive advantages,⁵ because the market continues to perceive them as likely to be saved in a future financial

¹ Standard & Poor (S&P) publicized in 2011 that government repeated assistance would be a permanent factor in forming banks' credit, as "banking crises will likely happen again" and the government's likelihood of support to systemic banks is "moderately high." See, e.g., STANDARD & POOR'S, BANKS: RATING METHODOLOGY AND ASSUMPTIONS 11 (2011), available at http://www.standardandpoors.com/spf/upload/Ratings_EMEA/2011-11-09_CBEvent_CriteriaFIBankRatingMethodologyAndAssumptions.pdf.

² Former Federal Reserve Chairman, Ben Bernanke said new regulations aim to end the need for subsidies. See Christopher Ryan, Elizabeth Warren: Too-big-to-fail Banks Get \$83bn/year Subsidy. Why?, AM BLOG (Feb. 28, 2013, 12:41PM), <http://americablog.com/2013/02/elizabeth-warren-83bn-bank-subsidy.html>.

³ See e.g., João Santos, Evidence from the Bond Market on Banks' "Too-Big-to-Fail" Subsidy?, 20 ECON. POL'Y REV. 2 (2014), available at <http://www.newyorkfed.org/research/epr/2014/1403afon1403sant.pdf> (The Federal Reserve Bank of New York's report, which was made public in March 26, 2014, described the advantages and benefits the biggest banks received because they are too-big-to-fail (TBTF), and the competitive advantage those benefits have given them over smaller banks. The report concluded that the largest U.S. banks are perceived by investors to enjoy an implicit guarantee from the government, and stated that, as a result, the largest U.S. banks enjoyed a lower cost of borrowing than both smaller banks and comparably sized nonbanks.); see also Gara Afonso, João Santos & James Traina, Do "Too-Big-to-Fail" Banks Take On More Risk?, 20 ECON. POL'Y REV. 2 (2014), available at <http://www.newyorkfed.org/research/epr/2014/1403afon.pdf> (a separate study, conducted by several Federal Reserve Bank of New York's researchers that found that the biggest banks are more likely to take more risks, relying on the government to save them if needed); IMF Survey, Big Banks Benefit From Government Subsidies, INTERNATIONAL MONETARY FUND (March 31, 2014), available at <https://www.imf.org/external/pubs/ft/survey/so/2014/pol033114a.htm> (reinforcing the New York Federal Reserve's findings); Kenichi Ueda & Beatrice Weder di Mauro, Quantifying Structural Subsidy Values for Systemically Important Fin. Ins., (IMF Working Paper WP/12/128, May 2012), available at <http://www.imf.org/external/pubs/ft/wp/2012/wp12128.pdf> (calculating the subsidy at \$83 billion a year for the 10 biggest banks, based on a discount that big banks receive, a 0.8 percentage point, which lowers the borrowing costs on all liabilities, including bonds and customer deposits).

⁴ "The largest financial institutions . . . are able to borrow money much more cheaply than other financial institutions, because their cost of credit is artificially reduced by the Too Big to Fail subsidy." See *Who is Too Big to Fail: Does Title II of the Dodd-Frank Act Enshrine Taxpayer-Funded Bailouts?: Hearing Before the Subcomm. on Oversight and Investigations of the H. Comm. on Financial Services*, 113th Cong. 4 (2013) (written testimony of David A. Skeel, Jr.), available at <http://financialservices.house.gov/uploadedfiles/hrg-113-ba09-wstate-dskeel-20130515.pdf>; see also Stijn Van Nieuwerburgh et al., *Too-Systemic-To-Fail: What Option Markets Imply About Sector-Wide Government Guarantees*, (Chicago Booth Research Paper No. 11-12, 2012), available at <http://ssrn.com/abstract=1762312> (supporting the idea that there is a TBTF subsidy).

⁵ Such competitive advantages include Title II authorizing the Federal Deposit Insurance Corporation (FDIC) to create a bridge institution that can be kept in place for up to five years, during which institutions get tax free status. Dodd-Frank Wall Street Reform and Consumer Protection Act, Pub.L. 111-203, § 210(h)(10), 124 Stat. 1376, 1496 (codified at 12 U.S.C. § 5390 (2010)). This advantage is clearly an indication that Title II does impose costs on taxpayers.

crisis.⁶ Therefore, not only do the biggest banks enjoy the benefits of being large and diversified, which is legitimate, but these large and often riskiest banks also receive the benefits of implicit and explicit government subsidies. The most significant subsidy, an implicit one, stems from market perception that the government will not allow the biggest banks to fail—that they are “too-big-to-fail” (TBTF)⁷—enabling them to borrow at lower interest rates.⁸ Indeed, smaller banks and financial institutions pay higher interest rates than TBTF institutions, because they do not have the same implied government guarantee that is given to the systemically important financial institutions (SIFIs),⁹ and so lenders view them as riskier.¹⁰ And while initially the guarantee only covered the biggest banks, commentators are concerned about such institutions’ ability to pass cost advantages on to their subsidiaries and affiliates,¹¹ extending the safety net, and the taxpay-

⁶ See, e.g., Viral V. Acharya, Deniz Anginer & A. Joseph Warburton, *The End of Market Discipline? Investor Expectations of Implicit State Guarantees* 13 (June 1, 2014), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1961656 (arguing that big banks borrow funds at lower costs from private lenders, because the implicit guarantees reduce the amount of big banks’ credit risk in comparison to smaller banks); Anat R. Admati et al., *On Collective Goods, Fallacies, Irrelevant Facts, and Myths in the Discussion of Capital Regulation: Why Bank Equity Is Not Expensive* 1–7 (Rock Center for Corporate Governance at Stanford Univ., Working Paper No. 161), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2349739.

⁷ “The structure of our current financial markets . . . has not been subject to the most important principle of all—the opportunity for market participants to fail.” See Robert Johnson, *Introduction to ROOSEVELT INST., MAKE MARKETS BE MARKETS* 9 (Robert Johnson & Erica Payne eds., 2010), available at <http://www.makemarketsbemarkets.org/report/MakeMarketsBeMarkets.pdf>; *Why Should Taxpayers Give Big Banks \$83 Billion a Year?*, BLOOMBERG (Feb. 20, 2013, 6:30PM) available at <http://www.bloomberg.com/news/2013-02-20/why-should-taxpayers-give-big-banks-83-billion-a-year-.html>.

⁸ See e.g., John C. Coffee, Jr., *Systemic Risk After Dodd-Frank: Contingent Capital and the Need for Regulatory Strategies Beyond Oversight*, 111 COLUM. L. REV. 795, 800–01 (2011); Stefan Jacewitz & Jonathan Pogach, *Deposit Rate Advantages At The Largest Banks* 4 (FDIC Division of Insurance Research Paper No. 2014-02, 2013), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2482352 (calculating differences in interest rates offered on various banks’ accounts between 2005–2010, the authors interpret the differences as the market perception of the banks’ riskiness and find that the biggest banks pay approximately 45 basis points less in risk premiums for uninsured deposits); Warburton et al., *supra* note 6.

⁹ On June 3, 2013, the Financial Stability Oversight Council (FSOC) voted on a proposal to designate a group of nonbank financial institutions as systemically important. There is some debate over whether such institutions should want to protest against such a designation, as it serves as an implicit guarantee that the government will bail out such defined institutions should they get into trouble, which, in turn, could give them a competitive advantage. See Danielle Douglas, *Council identifies non-bank financial companies for additional supervision*, WASH. POST, (June 3, 2013), available at http://www.washingtonpost.com/business/economy/council-identifies-non-bank-financial-companies-for-additional-supervision/2013/06/03/b4754d6a-cc63-11e2-9f1a-1a7cdee20287_story.html.

¹⁰ See generally Nizan Geslevich Packin, *The Case Against The Dodd-Frank Act’s Living Wills: Contingency Planning Following the Financial Crisis*, 9 BERKELEY BUS. L. J. 129 (2012).

¹¹ In order to block any potential spread of subsidies from banks to their affiliates, it has been suggested that Congress mandate a two-tiered structure of bank regulation and deposit insurance. The first tier would provide many banking-related services, but would not be able to engage or affiliate with insti-

ers' liability, to bank-related activities for which it was not intended.¹²

But not everyone agrees with the TBTF subsidies theory and its estimated scope.¹³ Certain commentators argue that the biggest banks are special because they create benefits for businesses that would not be available elsewhere,¹⁴ as the banking field facilitates substantial scale economies,¹⁵

tutions engaged in securities underwriting or dealing, insurance underwriting, or derivatives dealing or trading. The second tier could affiliate with such "nontraditional" financial institutions engaged in capital markets operations. However, "narrow banks" would not be allowed to make any extensions of credit or other transfers of funds to their nonbank affiliates, other than lawful dividends paid to their parent holding companies. See Arthur E. Wilmarth, Jr., "The Dodd-Frank Act: A Flawed and Inadequate Response to the Too-Big-To-Fail Problem," 89 OR. L.REV.951, 1034–52 (2011).

¹² Bank Compliance Guide, 2009 WL 2798952 (C.C.H.).

¹³ See the policy brief prepared by the Financial Services Forum, the Financial Services Roundtable, The Clearing House, Securities Industry and Financial Markets Association, and the American Bankers Association, *Financial Industry Addresses Alleged Large Bank Subsidy* (March 11, 2013), available

at http://images.politico.com/global/2013/03/10/financial_industry_addresses_alleged_large_bank_subsidy_11_march_13.html (hereinafter Policy Brief); Bert Ely, *Revisiting An Old Debate: Do Banks Receive A Federal Safety Net Subsidy?*, 18 No. 21 BANKING POL'Y REP. 8, 19 (Nov. 1, 1999) (arguing that "banks pay all costs of banking's federal safety net, including the subsidy. . . banks can operate with higher leverage ratios than their nonbank competitors because banks participate in, and pay for, a risk-spreading mechanism that safely permits higher leverage."). See also STEVE STOGIN ET AL., GOLDMAN SACHS, GLOBAL MARKETS INSTITUTE, MEASURING THE TBTF EFFECT ON BOND PRICING (May 2013), available at <http://www.goldmansachs.com/our-thinking/public-policy/regulatory-reform/measuring-tbtf-doc.pdf> (arguing that the six biggest U.S. banks enjoyed a certain funding advantage until the financial crisis, but has since reversed to a disadvantage); Mark Whitehouse, *Too-Big-to-Fail Myths*, Goldman Sachs Edition, BLOOMBERG, (May 28, 2013, 1:25AM), available at <http://www.bloomberg.com/news/2013-05-28/too-big-to-fail-myths-goldman-sachs-edition.html> (arguing, *inter alia*, that (i) it is hard to understand the rates at which big banks borrow money unless creditors are assuming that taxpayers are responsible for part of the risk; (ii) the fact that big banks have not incurred major losses for the FDIC serves only to show that the government cannot allow that to happen; and (iii) measuring the return on bailouts is an absurdly narrow method of looking at the cost of financial crisis, as distress at large financial institutions triggers broader crises with powerful economic repercussions). Note, however, that disagreeing responses were made to this Goldman report. See *e.g.*, President Richard W. Fisher, Correcting 'Dodd-Frank' to Actually End 'Too Big to Fail,' Statement before the Committee on Financial Services, U.S. House of Representatives (June 26, 2013), available at <http://www.dallasfed.org/news/speeches/fisher/2013/fs130626.cfm> (arguing that "[l]arge banks and their allies have pushed back against these points, producing a flurry of counter-claims in recent months. My staff and I have reviewed these arguments and have found them to be assertions lacking merit.").

¹⁴ Charles W. Calomiris, *Debate: Should Big Banks Be Broken Up?: The Opposition's Opening Remarks*, ECONOMIST (May 14, 2013), available at <http://www.economist.com/debate/days/view/977> (arguing that the largest banks' product diversity, large scale, and global reach create unique advantages for their customers).

¹⁵ See *e.g.*, *Noninterest Expense as Percent to Assets as of 12/31/2012 by the Banks reporting to the FDIC*, BANKBLOG (Nov. 18, 2014, 4:02 PM), <http://bankblog.optirate.com/wp-content/uploads/2013/06/NonIntExpToAssets2012.jpg> (showing significant economies of scale with the largest banks); David C. Wheelock & Paul Wilson, *Do Large Banks Have Lower Costs? New Estimates of Returns to Scale for U.S. Banks*, 44 J. OF MONEY, CREDIT, & BANKING 171, 171–99 (2012); see generally Joseph P. Hughes, et al., *Are Scale Economies in Banking Elusive or Illusive? Evidence Obtained by Incorporating Capital Structure and Risk-Taking into Models of Bank Production*, 25 J. OF BANKING & FIN. 2169

which make the TBTF banks a source of gains for society¹⁶ and justifies Congress' support of such subsidies. Put differently, megabanks argue they are worth protecting because they leverage revenue and cost synergies through economies of scale, and create benefits, which are passed on to their customers and investors, and lower the costs of finance for the entire society.¹⁷ In addition, they have been compiling an arsenal of reports and academic studies arguing that recent regulation has reduced their advantage as "systemically important" fiscal institutions. The 2014 GAO Report reflected this opinion, which makes the biggest banks more comfortably argue that there is no need for further regulation.¹⁸ Specifically, JPMorgan and Goldman Sachs have released reports that argue that any cost advantage they had during the 2008 crisis has shrunk with the passage of the Dodd-Frank Act.¹⁹

But, the megabanks have a hard time arguing that they receive no special subsidy. Indeed, while the debate on the TBTF subsidies has been getting a lot of attention in the last few years, it is not the first time it made its way to the headlines. During the 1980s, 1990s and early 2000s, the concept of TBTF and the related subsidies already received some attention, but the problematic issue remained unresolved.²⁰ And despite the actions regula-

(2001)(finding that bank holding companies of all sizes were operating with significant returns to scale and that increased risk-taking is associated with smaller-scale economies). Generally, "economies of scope" refers to the lowering average cost for a firm in producing two or more products. John C. Panzar & Robert D. Willig, *Economies of Scope*, 71 AM. ECON. REV. 268, 268 (1981).

¹⁶ Loretta J. Mester, *Scale Economies in Banking and Financial Regulatory Reform*, *The Federal Reserve Bank of Minneapolis* (Sept. 1, 2010), available at http://www.minneapolisfed.org/publications_papers/pub_display.cfm?id=4535#_ftnref12.

¹⁷ Jan Schildbach, *Universal Banks: Optimal For Clients And Financial Stability*, DEUTSCHE BANK (Nov. 20, 2012), http://www.dbresearch.com/PROD/DBR_INTERNET_EN-PROD/PROD0000000000296976.pdf.

¹⁸ Alison Fitzgerald, *Banks Seek to Sway Critical GAO Report*, FORBES (Jan. 17, 2014 6:00AM), <http://www.forbes.com/sites/centerforpublicintegrity/2014/01/17/banks-seek-to-sway-critical-gao-report/>; see generally U.S. GOV'T ACCOUNTABILITY OFFICE, GAO-14-621, HOLDING COMPANIES: EXPECTATIONS OF GOVERNMENT SUPPORT (2014), available at <http://www.gao.gov/products/GAO-14-621> (finding that the largest American banks enjoyed lower funding costs than smaller rivals during the 2008 economic crisis but that such an advantage has declined in recent years); see also Gretchen Morgenson, *Big Banks Still a Risk*, N.Y. TIMES (August 2, 2014), http://www.nytimes.com/2014/08/03/business/big-banks-still-a-risk.html?_r=0 (discussing the GAO report and stating that "its methodology was convoluted and its conclusions hardly definitive). The report said that while the big banks had enjoyed a subsidy during the financial crisis that benefit "may have declined or reversed in recent years. . . In other words, were we to return to panic mode, the value of the implied taxpayer backing would rocket. The threat of high-cost taxpayer bailouts remains very much with us." *Id.* Responding to the GAO report, Stanford Professor Admati and Boston College Professor Kane persuasively testified in front of the Senate Banking Committee on why the GAO report should not be taken too seriously. According to Professor Kane, "[t]he G.A.O. fell into the trap of thinking of bailout expenditures as either loans or insurance. That ignores the lower cost of equity that taxpayer guarantees also provide to big banks." *Id.*

¹⁹ *Id.*

²⁰ It is not plausible to eliminate the subsidy all together, even though the "obvious economic answer is to tax this externality and cancel the subsidy. But eliminating subsidies and taxing externalities

tors took, in 2013, media reports sent shockwaves across the global financial markets estimating that the value of the combined financial advantages²¹ for the six largest U.S. banks since the start of 2009 was at least \$102 billion.²² Other studies, trying to also calculate the scope of the subsidies using different methodologies, also point at massive estimates.²³ Moreover, a report that followed-up on those publications estimated that two of the biggest financial institutions in the U.S.—Bank of America Corp and Citigroup Inc.—were much more dependent on governmental backstops than similarly sized competitors and that their profits would have been negative if not for the government subsidies.²⁴ Likewise, a 2012 study demonstrated that the subsidies that the largest U.S. banks received were roughly equivalent to those banks' total profits over the four quarters prior to June 2012.²⁵ And while the Dodd-Frank Act does attempt to put a stop

means making banks less profitable, and every possible level of the industry will predictably fight any such program—usually with the politically potent counterargument that imposing higher costs on TBTF banks will reduce employment and lending.” See John C. Coffee, Jr., *The Political Economy of Dodd-Frank: Why Financial Reform Tends to Be Frustrated and Systemic Risk Perpetuated*, 97 CORNELL L. REV. 1019, 1066 (2012).

²¹ Other subsidies' estimates include (i) 360 billion in Federal Reserve subsidies; (ii) \$120 billion in federal deposits insurance; (iii) \$100 billion in government-guaranteed loans; (iv) at least \$100 billion in monopolistic advantages in the secondary market for home mortgages; and (v) at least \$100 billion in fees in over-the-counter (OTC) derivative markets. See *Top Banking Analyst: Subsidies to Giant Banks Exceed \$780 Billion Dollars Per YEAR*, WASHINGTONS BLOG (Mar. 13, 2013), available at <http://www.washingtonsblog.com/2013/03/top-banking-analyst-subsidies-to-giant-banks-exceed-780-billion-year.html>.

²² Bob Ivry, *No Lehman Moments as Biggest Banks Deemed Too Big to Fail*, BLOOMBERG (May 10, 2013, 12:00AM), available at <http://www.bloomberg.com/news/2013-05-10/no-lehman-moments-as-biggest-banks-deemed-too-big-to-fail.html>.

²³ See e.g., Dean Baker & Travis McArthur, *The Value of the “Too Big to Fail” Big Bank Subsidy* 2, CTR. FOR ECON. & POLICY RESEARCH (Sept. 2009), available at <http://www.cepr.net/documents/publications/too-big-to-fail-2009-09.pdf> (as further described below, the authors found an implied annual subsidy of \$34 billion to the biggest banks with more than \$100B in assets); ACHARYA et al., *supra* note. 6; Bryan Kelly, et al., *Too Systemic To Fail: What Option Markets Imply About Sector-Wide Government Guarantees* (University of Chicago Booth School of Business Working Paper, No. 11-12, 2011) (calculating that the anticipation of government intervention during a financial crash lowered the price of financial sector collapse insurance and resulted in a government guarantee extended to the financial sector during the crisis that valued at over \$150 billion); Zoe Tsesmelidakis & Robert C. Merton, *The Value of Implicit Guarantees* (Working Paper, Sept. 2012), available at <http://ssrn.com/abstract=2231317> (arguing that wealth transfers to investors reached \$365 billion between 2007–2010).

²⁴ See The Motley Fool, *Bank of America Corp (BAC) and Citigroup Inc. (C): How Stable, Really?*, INSIDER MONKEY (May 30, 2013, 9:50AM), <http://www.insidermonkey.com/blog/bank-of-america-corp-bac-and-citigroup-inc-c-how-stable-really-154274/>; Robert Johnson *supra* note 7 at 9 (“Financial sector CEOs have relied on taxpayer support . . . benefitted from express taxpayer bailouts as well as secret “back door” deals. They continue to lead companies that seem to make profit but actually only thrive because of [] subsidies and taxpayer support.”).

²⁵ Charles W. Murdock, *The Big Banks: Background, Deregulation, Financial Innovation, And “Too Big To Fail,”* 90 DENV. U. L. REV. 505, 505 (2012).

to the TBTF benefits²⁶ by forcing SIFIs to internalize the costs and risks of their activities²⁷ and prohibiting the Federal Reserve from making extraordinary loans to them, it has not yet offered a real solution to end the problem.²⁸ The Dodd-Frank Act also does not prohibit the government from giving financial support framed in a more general fashion.²⁹ As a result, government implicit and explicit subsidies and “transfers from taxpayers to the[] [SIFIs’] shareholders” continue.³⁰

While I argue in this article that the TBTF subsidies are massive and do exist, whether one agrees or not, using traditional arguments about subsidies in the TBTF context is not enough. Typically, direct transfers describe some of the techniques that governments use to transfer value to private entities, but there are various policies, which enable politicians to give less visible financial benefits.³¹ But what many types of subsidies have in common is that too often narrow political interests drive market interferences,³² which result in negative consequences. And not only have politically-driven subsidies had a poor record of historical success,³³ often such subsidies end up unintentionally hampering the accomplishment of social goals,³⁴ and impeding the ability of new businesses to fairly compete in the

²⁶ President Obama declared, “Because of this law . . . [t]here will be no more taxpayer-funded bailouts. Period.” Stacy Kaper, *Obama Signs Historic Regulatory Reform Bill into Law*, AM. BANKER (July 21, 2010), <http://www.americanbanker.com/news/obama-1022698-1.html>.

²⁷ See Arthur E. Wilmarth, Jr., *Reforming Financial Regulation to Address the Too-Big-To-Fail Problem*, 35 BROOK. J. INT’L L. 707, 713 (2010).

²⁸ See generally *Examining the GAO Report on Government Support for Bank Holding Companies: Hearing Before S. Comm. On Banking, Housing, & Urban Affairs*, 113th Cong. 34 (2014) (statement of Lawrence Evans, Director, Financial Markets and Community Investment, GAO), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113shrg93180/pdf/CHRG-113shrg93180.pdf>.

²⁹ See Skeel, *supra* note 4.

³⁰ See Bloomberg, *supra* note 7.

³¹ Doug Koplow, *Subsidies in the US Energy Sector: Magnitude, Causes, and Options for Reform, Subsidies and Sustainable Development: Political Economy Aspects* (OECD: Paris, France, 2007), available at http://www.earthtrack.net/files/uploaded_files/OECD_Reform2007.pdf.

³² See Joe Stephens & Carol D. Leonnig, *Solyndra: Politics Infused Obama Energy Programs*, WASH. POST, (Dec. 25, 2011), http://www.washingtonpost.com/solyndra-politics-infused-obama-energy-programs/2011/12/14/gIQA4HIIHP_story.html (stating that political pressures undermine sound economic choices, and that a recent example of this is the “Obama’s green-technology program was infused with politics at every level.”).

³³ See e.g., the Congressional Budget Office statements concerning the poor record of energy subsidies: “Federal programs have had a long history of funding fossil-fuel technologies that, although interesting technically, had little chance of commercial implementation. As a result, much of the federal spending has not been productive.” CONGRESSIONAL BUDGET OFFICE, BUDGET OPTIONS 60 (2003) available at https://www.cbo.gov/sites/default/files/entirereport_6.pdf, p. 60; U.S. GOVERNMENT ACCOUNTABILITY OFFICE, GAO-01-854T, FOSSIL FUEL R&D: LESSONS LEARNED IN THE CLEAN COAL TECHNOLOGY PROGRAM 2 (June 12, 2001).

³⁴ Subsidies have “a stifling effect on innovation, as private capital chases fewer deals and companies that do not have government backing have a harder time attracting private capital.” See Darryl Siry, *In Role as Kingmaker, the Energy Department Stifles Innovation*, WIRED, (Dec. 1, 2009, 8:30AM) available at <http://www.wired.com/autopia/2009/12/doe-loans-stifle-innovation/>.

marketplace.³⁵

Focusing on the financial sector, the subsidies the largest financial institutions receive have several perverse effects. First, the government's support to the biggest banks can be viewed as an unfair competitive advantage over smaller banks that hurts the economy, resulting in many smaller banks' failures, especially since 2008.³⁶ Despite having a fairly cheap source of capital due to deposits insurance, small banks are still disfavored as they fully pay for deposits insurance, unlike the biggest banks that hold different types of assets and for many of which historically they did not pay³⁷—the same big banks that enjoy the benefits of market perception that the government will not let them fail. Second, it is not clear whether the grant of TBTF subsidies by Congress negatively impacts the delicate and balanced separation of powers concept, given how Congress' power to provide subsidies is being used and not monitored. Third, the data on TBTF subsidies is very fragmented and it is extremely difficult to calculate the subsidy's total value. Specifically, a large number of the non-cash political interventions are difficult to quantify because the data necessary to do so is deficient, particularly because many government programs are involved, across different agencies, in the financial sector. Fourth, a semi-immunity policy, which has been nicknamed "too-big-to-jail," *de facto* exempts the biggest banks from criminal statutes and increases the absolute value of the TBTF subsidies as it translates into an additional economic advantage.³⁸ Finally, it has been long argued in other contexts that subsidies change the behavior of businesses.³⁹ Specifically, the subsidies that the biggest banks receive incentivize them to borrow more and to take more excessive risks. The subsidies make certain actors in the market have "less incentive to evaluate the quality of the firm's business model, its management, and its risk-taking behavior. As a result, such institutions face lim-

³⁵ Koplou, *supra* note 31.

³⁶ Bank failures include instances where banks (i) were taken over or merged with another financial institution, (ii) declared insolvent or liquidated, or (iii) filed for bankruptcy. A list of failed banks, which mainly includes smaller banks that have failed since October 1, 2000 and have been liquidated by the FDIC is available at <http://www.fdic.gov/bank/individual/failed/banklist.html>.

³⁷ Philip Swagel, *Reducing the Impact of Too Big to Fail*, N.Y. TIMES (Nov. 29, 2012 12:01 AM), <http://economix.blogs.nytimes.com/2013/11/29/reducing-the-impact-of-too-big-to-fail/> (discussing the unlevelled playing field, but mentioning that "[t]hree important changes made since the financial crisis affect the funding costs of large banks in a way that suggests a reduced government subsidy").

³⁸ See Cornelius Hurley, *GAO Must Ensure Accurate Accounting in TBTF Study*, AM. BANKER (Sept. 24, 2013, 3:00PM), <http://www.americanbanker.com/bankthink/gao-must-ensure-accurate-accounting-in-tbtf-study-1062337-1.html> (arguing that this policy was essentially articulated by Attorney General Eric Holder.).

³⁹ Chris Edwards & Tad DeHaven, *Corporate Welfare Spending vs. the Entrepreneurial Economy*, CATO INST. (June 1, 2012) House Budget Committee, available at <http://www.cato.org/publications/congressional-testimony/corporate-welfare-spending-vs-entrepreneurial-economy> ("[w]hen the government starts handing out money, businesses with weak ideas get in line because the businesses with the good ideas can get private funding.").

ited market discipline, allowing them to obtain [more and more] funding on better terms than the quality or riskiness of their business would merit, and giving them incentives to take on excessive risks.”⁴⁰

The article commences by discussing the concept of subsidies, and describes the different estimates concerning TBTF subsidies, and their arguable scope. This includes outlining various TBTF subsidy studies and explaining which are more persuasive and which are not. The article then continues by exploring the perverse effects, which result from granting subsidies to megabanks. The article then outlines the solutions that have been suggested thus far to the TBTF problem and focus on: (i) increasing capital and liquidity requirements for banks; (ii) shifting the focus to the creditors of megabanks,⁴¹ to make the creditors take losses when the banks run into trouble;⁴² (iii) setting activities⁴³ and size restrictions;⁴⁴ (iv) reducing the economy’s exposure, following the Dallas Fed Plan; and (v) setting aside reserves equal to the net advantage that the large banks get for being SIFIs.⁴⁵ The article then suggests incorporating a user-fee mechanism, which could be used together with other approaches to help address the problem, and concludes with some comments on the potential solutions.

⁴⁰ See Ben S. Bernanke, Former Chairman of the Board of Governors of the Federal Reserve System, Speech at the Independent Community Bankers of America National Convention, Orlando, Florida: Preserving a Central Role for Community Banking (Mar. 20, 2010), available at <http://www.federalreserve.gov/newsevents/speech/bernanke20100320a.htm>.

⁴¹ See Paul Melaschenko & Noel Reynolds, *A template for recapitalising too-big-to-fail banks*, BIS Q. REV., June 2013, at 25, available at http://www.bis.org/publ/qtrpdf/r_qt1306e.pdf.

⁴² The structure of a bail-in differs from contingent capital liabilities such as CoCos, which provide for contingent conversion to equity in the case of financial institution failure. Although a conversion trigger is required in both cases, CoCos are purchased by investors on the basis of possible conversion from debt to equity, with maximum losses equivalent to the notional security face value. A bail-in results in mandatory conversions with the total write-down level that will be set by the level of a bank’s losses. See e.g., Thomas H. Jackson & David A. Skeel, Jr., Dynamic Resolution of Large Financial Institutions, 2 *HARV. BUS. L. REV.* 435, 451-455 (2012); Thomas Conlona & John Cotter, *Anatomy of a Bail-In* (Mar. 26, 2014), available at <http://ssrn.com/abstract=2294100>.

⁴³ This is the aim of the Volcker rule, which prohibits banks from “engaging in proprietary trading” or “acquir[ing] or retain[ing] any equity, partnership, or other ownership interest in or sponsor[ing] a hedge fund or a private equity fund.” Steven L. Schwarcz, *Ring-Fencing*, 87 *S. CAL. L. REV.* 69, 80 (2013). Similar structural bank regulation initiatives currently being considered include the Vickers Commission proposal in the U.K., the Liikanen Report in the EU, and draft legislation in France and Germany that aim to reduce scope economies and eliminate implicit TBTF subsidies, by limiting bank activities. See Leonardo Gambacorta & Adrian van Rixtel, *Structural Bank Regulation Initiatives: Approaches and Implications* 1–3, 9 (Bank for International Settlements, Working Papers No. 412, 2013), available at <http://www.bis.org/publ/work412.pdf>.

⁴⁴ See James R. Barth et al., *Just How Big Is the Too Big to Fail Problem?*, MILKEN INSTITUTE 3 (Mar. 2012), available at <https://www.milkeninstitute.org/pdf/TBTF.pdf>.

⁴⁵ See e.g., Barbara A. Rehm, *An Alternative Plan to Fix TBTF: Lay Big Banks’ Subsidy Bare*, AM. BANKER (Jul. 24, 2013, 2:14 PM), available at http://www.americanbanker.com/issues/178_142/an-alternative-plan-to-fix-tbtf-lay-big-banks-subsidy-bare-1060847-1.html.

II. THE TBTF BANKS AND SUBSIDIES

A. Government Subsidies – a Quick Overview

Neoliberalism adopts and advances the neoclassical version of economics as a matter of scientific fact, separated from politics or ideology.⁴⁶ Neoclassical economics asserts that because of resources' scarcity a society cannot have everything, and an impartial cost-benefit calculation of which subsidies are public rights and which are public wrongs thereby becomes a question of objective economics rather than politics.⁴⁷ According to this theory, "efficient" policies are such that result in a larger overall size of the economic "pie," and "redistributive" policies are such that alter the size of the different pie slices.⁴⁸ Policymakers and scholars believe that the opposition between wealth and resources creation and wealth and resources division formulates the fundamental framework for analysis of law and policy today.⁴⁹ The primacy of efficiency over redistribution is the main principle of the neoliberal "consensus" that lies in the heart of current policymaking in the U.S. and many other parts of the world.⁵⁰

Relying on different elements of these theories, governments provide industries with subsidies, which are a method of support given without any pay-back obligation on the receiving end.⁵¹ Subsidies can take various forms and can be granted using different types of policies, which include direct and indirect transfers or taxes.⁵² Although the concept of subsidies can be viewed as economically inefficient, they are common in most countries.⁵³ Politicians typically base their support for subsidies on the argument that giving subsidies can help create jobs and businesses, which would improve the economy and result in greater tax revenues that would help repay the subsidies.⁵⁴ But many have a more cynical view that calls attention

⁴⁶ See e.g., Joshua Cooper Ramo, *The Three Marketeers*, TIME, Feb. 15, 1999, at 39 (reporting that the leading U.S. policymakers insisted on focusing on free-market economic facts beyond ideology or partisan considerations).

⁴⁷ See Martha T. McCluskey, *Subsidized Lives and the Ideology of Efficiency*, 8 AM. U. J. GENDER SOC. POL'Y & L., 115, 120 (2000).

⁴⁸ See A. Mitchell Polinsky, *An Introduction to Law and Economic* 7 (2nd ed. 1989).

⁴⁹ See McCluskey, *supra* note 47, at 121.

⁵⁰ See Gerald Epstein, Julie Graham & Jessica Nembhard, *INTRODUCTION to Creating A New World Economy: Forces of Change and Plans for Action* 3–4 (1993) (criticizing the new "conservative consensus" regarding free market ideology); Michell Chossudovsky, *The Globalization of Poverty* 17 (1997) (summarizing the consensus regarding neoliberal policy agenda).

⁵¹ See WEBSTER'S COLLEGIATE DICTIONARY 1174 (10th ed. 1996).

⁵² See Koplw, *supra* note 31.

⁵³ See CONG. BUDGET OFFICE, *International Affairs*, in BUDGET OPTIONS 105, 108 (2000), available at https://www.cbo.gov/sites/default/files/wholereport_0.pdf; see generally Alan O. Sykes, *The Questionable Case for Subsidies Regulation: A Comparative Perspective* (Stanford Univ. School of Law & Econ. Research Paper Series, Paper No. 380), available at <http://ssrn.com/abstract=1444605>.

⁵⁴ Dale A. Oesterle, *State and Local Government Subsidies For Businesses: A Siren's Trap*, 6 OHIO

to the fact that politicians are usually motivated by short-term incentives,⁵⁵ and that often subsidies are not required or efficient.⁵⁶ This view is partly the result of two main factors. First, there is very little transparency regarding approved subsidies, or tax expenditures, and thus almost no public oversight, especially when dealing with indirect subsidies,⁵⁷ despite legislatures' past attempts to improve transparency.⁵⁸ Second, economists who focus on the political nature of subsidies,⁵⁹ are doubtful if subsidies are necessary,⁶⁰ and argue that the answer depends on the elusive quest for a notably positive "Keynesian Multiplier"⁶¹ for every dollar invested.⁶² Specifically, theoretical economists by and large can be divided into two groups—the Keynesians, who are pro-subsidies, but make their specific determinations based on the specific data, and the anti-Keynesian theorists, who believe that most governmental attempts to stimulate markets via transfer

ST. ENTREPRENEURIAL BUS. L. J. 491, 494 (2011).

⁵⁵ See JAMES M. BUCHANAN & RICHARD E. WAGNER, *DEMOCRACY IN DEFICIT* 48–50, 96–98 (1977) (arguing that subsidies are created “by politicians engaged in a continuing competition for office Political decisions in the United States are made by elected politicians, who respond to the desires of voters and the ensconced bureaucracy. There is no center of power where an enlightened few can effectively isolate themselves from constituency pressures”).

⁵⁶ See e.g., Doug Koplow, *Accountability and the Public Official: The Case for Pay-for-Performance for Congress and the President*, EARTH TRACK (Feb. 1996), available at <http://earthtrack.net/accountability-elected-official> (discussing how to improve the connection between budgetary balance and Congressional pay).

⁵⁷ *Id.*; Koplow, *supra* note 31, at 11–12 (arguing that legislative activities practices' transparency has to improve).

⁵⁸ The *Federal Funding Accountability and Transparency Act of 2006*, 31 U.S.C. § 6101 (2006), which passed the U.S. Senate in September of 2006, requires full public disclosure of all entities receiving government funds beginning in fiscal year 2007, and a website maintaining that data is managed by the Office of Management and Budget.

⁵⁹ See e.g., Mary Clare Jalonick, *Farm Subsidies Highlight the Hypocrisy of Anti-Spending Politicians*, HUFFINGTON POST (Nov. 14, 2010, 11:02 AM), available at http://www.huffingtonpost.com/2010/11/14/farm-subsidies-politicians-who-get-them-_n_783322.html.

⁶⁰ Richard M. Vogel, *Relocation Subsidies: Regional Growth Policy or Corporate Welfare?*, 32 REV. RADICAL POL. ECON. 437, 438 (2000) (noting that “subsidies have traditionally been viewed with skepticism by economists . . .”).

⁶¹ See, e.g., James C.W. Ahiakpor, *On the Mythology of the Keynesian Multiplier*, 60 AM. J. ECON. SOC. 745, 745–773 (2001) (discussing the Keynesian Multiplier). Focusing on raising employment rates, John M. Keynes argued that government spending is a valuable tool, which should be used even if the government has to borrow funds in order to stimulate economic activity and create jobs. Keynes believed that such stimulus will enable individuals to have more funds to spend, which will cause aggregate demand to increase, which will result in more production and hiring. Thus, government spending leads to a cascade effect, and the ratio of the primary government spending to the total impact is the “Keynesian Multiplier.” See Robert J. Barro, *Government Spending is No Free Lunch*, WALL ST. J., Jan. 22, 2009, at A17, available at <http://online.wsj.com/articles/SB123258618204604599>.

⁶² Traditional theory holds that government spending is a success if the Keynesian Multiplier is over 1.0. Thus, a failure under this theory is when following a government spending the national production increases by less than a dollar for every dollar spent. *Id.* (the Obama's administration calculated the stimulus spending multiplier at around 1.5).

payments do more harm than good.⁶³ Similarly, modern empirical economists also argue against subsidies, and include Harvard's Robert Barro, who said that governments do not necessarily use resources productively.⁶⁴ In recent years' studies, modern empirical economists maintained that most government subsidies do not provide necessary justification for their existence.⁶⁵ Moreover, certain scholars argue that it is questionable if the historic view of what is a successful subsidy based on Keynesian theory is not outdated.⁶⁶ Indeed, when factoring in the effect of new taxes on increased national productivity, or the interest payments that the government needs to pay on funds it borrows for its spending, it is clear that the traditional

⁶³ These economists include the Monetarists, who follow Milton Friedman and view monetary policy—controlling interest rates—as what the government's responsibility in the market, the Neoclassicists, who focus on the significance of individual economic decisions, and the Austrians, who focus on nongovernment dominated free markets. See, e.g., Milton Friedman & Anna Jacobson Schwartz, *A Monetary History of the United States 1867-1960* (1963); Bennett T. McCallum, *Monetarism*, in *The Concise Encyclopedia of Economics* (David R. Henderson ed., 2nd ed.), available at <http://www.econlib.org/library/Enc/Monetarism.html> (last visited June 21, 2013); E. Roy Weintraub, *Neoclassical Economics*, in *The Concise Encyclopedia of Economics* (David R. Henderson ed., 1st ed.) available at <http://www.econlib.org/library/Enc1/NeoclassicalEconomics.html> (last visited June 21, 2013); Peter J. Boettke, *Austrian School of Economics*, in *The Concise Encyclopedia of Economics* (David R. Henderson ed., 1st ed.), available at <http://www.econlib.org/library/Enc/AustrianSchoolofEconomics.html> (last visited June 21, 2013).

⁶⁴ According to Barro, the Keynesian argument “implicitly assumes that the government is better than the private market at marshaling idle resources to produce useful stuff. Unemployed labor and capital can be utilized at essentially zero social cost, but the private market is somehow unable to figure any of this out.” Similarly, economist Dwight Lee argued that “increased *real* aggregate demand is the result, not the cause, of an increasingly productive and prosperous economy.” See Doug Bandow, *Federal Spending: Killing the Economy with Government Stimulus*, FORBES (Aug. 6, 2012), <http://www.forbes.com/sites/dougbandow/2012/08/06/federal-spending-killing-the-economy-with-government-stimulus/2/>.

⁶⁵ Economists John Cogan and John Taylor reviewed The American Recovery and Reinvestment Act of 2009, (ARRA), Pub. L. No. 111–5, 123 Stat. 115 (2009), known as the Stimulus Plan, and concluded that “despite the large size of the program, the dollar volume of additional government purchases that it has generated has been negligible.” *The Stimulus: Two Years Later Before the Comm. on Oversight and Gov't Reform, Subcomm. on Regulatory Affairs*, 112th Cong. 1 (2011) (statement of John B. Taylor), available at <http://media.hoover.org/sites/default/files/documents/2009-Stimulus-two-years-later.pdf>. Referring to stimulus attempts during the 1970s, they said that government stimulus programs “did not work then and they are not working now.” *Id.* Similarly, Barro argued that recent studies show that most subsidies did not provide a Keynesian multiplier of 1.0, which even zealous Keynesians advocates view as required. See e.g., Robert J. Barro & Charles J. Redlick, *Stimulus Spending Doesn't Work*, WALL ST. J., Oct. 1, 2009, at A24; Robert J. Barro, *Voodoo Multipliers*, THE ECONOMISTS' VOICE (Feb. 2009), http://www.economics.harvard.edu/faculty/barro/files/09_02_VoodooMultipliers_EconomistsVoice.pdf. Similarly, a University of Chicago professor argued that “data and economic reasoning suggest that the effect of government spending on G.D.P. was minimal at best.” See Casey B. Mulligan, *The Minimal Impact of the Stimulus*, N.Y. TIMES (Mar. 2, 2011), available at <http://economix.blogs.nytimes.com/2011/03/02/the-minimal-impact-of-the-stimulus/>.

⁶⁶ Dale A. Oesterle, *State and Local Government Subsidies for Businesses: A Siren's Trap*, 6 OHIO ST. ENTREPRENEURIAL BUS. L. J. 491, 497–98 (2011).

Keynesian multiplier is too low.⁶⁷

Despite the widely acknowledged negative aspects of subsidies many governments still give them to various industries,⁶⁸ and some even argue that giving subsidies has become an imperative as markets become globalized and ever more competitive. The U.S. government provides subsidies to many industries including oil and natural gas,⁶⁹ mining,⁷⁰ agriculture,⁷¹ energy,⁷² postal services,⁷³ and fishing,⁷⁴ and other industries have been considered.⁷⁵ And while subsidies for private industries by and large have been disliked,⁷⁶ especially in the last few years, every time Congress has proffered a public policy interest in the government stepping in to prop up a certain industry, it did so. At the same time, a number of other factors that in the past helped constrain spending have proved to be no longer in use, including Presidential Vetoes.⁷⁷ Indeed, the Obama and Bush administra-

⁶⁷ A national production increase of one dollar produces twenty-five cents in increased federal tax revenue. See Revenue Statistics-Comparative Tables, OECD, <http://stats.oecd.org/Index.aspx?DataSetCode=REV> (last visited June 24, 2013). In 2011, the federal tax revenue as a GDP percentage was 25.1%. Thus, we should expect a twenty-five cent raise in tax revenue for every dollar increase in national production. Moreover, the government is spending now and receiving taxes from future increased national production, which means that it must borrow money and pay interest. Thus, we need a multiplier of at least 4.0, rather than the historic 1.0, to stay solvent. *Id.* at 498.

⁶⁸ See e.g., David Malin Roodman, *Paying the Piper: Subsidies, Politics, and the Environment*, Washington, D.C.: Worldwatch Paper 133, 199, (1996) (most subsidies are obsolete, inefficient, and ineffective, and the case for complete reforms is thus compelling, as it will make subsidies work better and cut taxes); Joshua P. Fershee, *Energy Subsidies*, in *Berkshire Encyclopedia Of Sustainability*, in 3 THE LAW AND POLITICS OF SUSTAINABILITY 158 (Klaus Bosselmann et al. eds., 2011) (all countries give energy subsidies to increase access to energy resources and output).

⁶⁹ The Clean Energy Act of 2007, H.R. 6, 110th Cong. (2007) [hereinafter the "Oil Act"]

⁷⁰ See Laura, Beans, *Report Confirms Coal Companies Receive Massive U.S. Taxpayer Subsidies for Mining on Public Lands*, ECOWATCH (June 12, 2013, 9:42AM), available at <http://ecowatch.com/2013/coal-companies-receive-taxpayer-subsidies/>.

⁷¹ See e.g., Steve Baragona, *US Senate Ends One Farm Subsidy, Adds Another*, VOICE OF AMERICA (June 10, 2013), <http://www.voanews.com/content/us-senate-ends-one-farm-subsidy-adds-another/1679207.html> (discussing a \$955 billion Farm Bill); see generally Matthew C. Porterfield, *U.S. Farm Subsidies and the Expiration of the WTO's Peace Clause*, 27 U. PA. J. INT'L ECON. L. 999 (2006) (discussing the U.S. Farm Subsidies).

⁷² See e.g., Joshua P. Fershee, *Promoting an All of the Above Approach or Pushing (Oil) Addiction and Abuse?: The Curious Role of Energy Subsidies and Mandates in U.S. Energy Policy*, 7 ENV. & ENERGY LAW & POLICY J., at 2 (2012).

⁷³ Larry Clifton, *U.S. Postal Service Back for Record \$14 Billion Subsidy*, THE EXAMINER (Nov. 15, 2012), <http://www.examiner.com/article/u-s-postal-service-back-for-record-14-billion-subsidy>.

⁷⁴ See Press Release on U.S. Direct Fishing Subsidies Equal One-fifth the Value of U.S. Catch (Mar., 2009), available at <http://www.rocean.org/press-release/new-study-shows-eliminating-harmful-subsidies-could-improve-health-us-fisheries> (\$713 million annual subsidies go to the fishing sector).

⁷⁵ See generally Brad A. Greenberg, *A Public Press? Evaluating the Viability of Government Subsidies for the Newspaper Industry*, 19 UCLA ENT. L. REV. 189 (2012).

⁷⁶ See, e.g., John Tamny, *Why Tax Subsidies for Plant & Equipment Are Anti-Growth*, REAL CLEAR MARKETS (Sept. 26, 2013), http://www.realclearmarkets.com/articles/2013/09/26/what_gm_fedex_and_google_tell_us_about_100_equipment_depreciation_100626.html.

⁷⁷ KEVIN R. KOSAR, CONG. RESEARCH SERV., RS22188, REGULAR VETOES AND POCKET VETOES:

tions have been inactive about using their veto power to thwart appropriations bills, despite the frequency with which other Presidents did so in the past.⁷⁸ Without the threat of actual vetoes, legislators are less concerned with constraining spending. Accordingly, the number of Congressional earmarks grew tenfold between 1990 and 2005.⁷⁹ The subsidies included funds to industries that have a tangible connection to the financial system, operations meant to expand the workforce, and efforts to promote home ownership.

B. The TBTF Subsidy

They were careless people . . . they smashed up things and creatures and then retreated back into their money or their vast carelessness, or whatever it was that kept them together and let other people clean up the mess they had made

— F. Scott Fitzgerald, *The Great Gatsby*

1. Background

Even before the 2008 financial crisis, subsidizing financial institutions has been viewed as a problematic policy. In August 1989, Congress repealed the Federal Savings and Loan Insurance Corporation's financial institutions' tax benefit provisions⁸⁰ after an unfavorable report prepared by the House Committee on Ways and Means⁸¹ advocated against the tax benefits. The report stated that the "subsidy provided to financially troubled financial institutions through more favorable tax rules than those applicable to other taxpayers is an inefficient way to provide assistance to such institutions."⁸² It endorsed the abolition of any such "indirect assistance."⁸³

During the 1990's and early 2000's, regulators made a number of statutory and regulatory changes in an attempt to lessen the impact of the gov-

AN OVERVIEW (2008), available at <http://www.senate.gov/reference/resources/pdf/RS22188.pdf> ("The U.S. Constitution (Article I, Section 7) provides that . . . President may sign a bill into law within the 10-day period . . . or veto it.").

⁷⁸ See e.g., *id.*; Koplow, *supra* note 31; The American Presidency Project at UC Santa Barbara, *Presidential Vetoes: Washington–Obama*, <http://www.presidency.ucsb.edu/data/vetoes.php>.

⁷⁹ John Fund, *Time for a Time-Out? Will the GOP learn its lesson on Pork?*, WALL ST. J. (Sept. 18, 2006), <http://online.wsj.com/article/SB122529312756180443.html>.

⁸⁰ This legislation was passed as the Financial Institutions Reform, Recovery and Enforcement Act of 1989 ("FIRREA"), Pub. L. No. 101-73, 103 Stat. 183 (1989).

⁸¹ The Committee on Ways and Means is the chief tax-writing committee in the House of Representatives. See *Committee History*, COMM. ON WAYS AND MEANS, <http://waysandmeans.house.gov/about/history.htm>.

⁸² H.R. Rep. No. 54, 101st Cong., 1st Sess., pt. 2 at 25 (1989).

⁸³ H.R. Rep. No. 101-54, at 25 (1989), U.S. Code Cong. & Admin. News 1989, at 86, 356.

ernment safety net to banks' operations.⁸⁴

Among the changes were the (i) Basel Accords, which established international minimum capital measures as well as capital tier requirements to the risk profiles of banks; (ii) Federal Deposit Insurance Corporation Improvement Act (FDICIA), which included provisions designed to limit regulatory forbearance by requiring more-timely and less discretionary intervention;⁸⁵ (iii) FDICIA's "least-cost test," under which, with rare exceptions, the FDIC may meet its insurance obligations by means other than a payoff only if the other method is deemed "least costly" to the deposit insurance funds; (iv) FDICIA requirement that the FDIC develop and implement a system of risk-based deposit insurance premiums; (v) Omnibus Budget Reconciliation Act, which was passed in 1993, and included a national depositor preference statute that changed the priority of claims on failed depository institutions so that a failed bank's depositors, and by implication the FDIC, have priority over the claims of general creditors, which in turn were expected to demand higher interest rates on their funds and more collateral to compensate for their increased risk of loss; (vi) FDICIA's restrictions of the Federal Reserve's ability to lend to undercapitalized banks through the discount window, or to lend to banks that fall below minimum capital standards, because restricting such banks' access to the discount window reduces the gross subsidy that flows from the access; and (vii) changes to payments system policies that reduced the subsidy arising from the Federal Reserve's guarantee of transactions on the Federal Reserve's large-dollar electronic payments system. These changes included forming a system of credit limit on institutions' daily payment wiring overdrafts, and charging fees for daylight overdrafts incurred in Federal Reserve Banks' accounts. The debt limits and daylight overdraft fees led to (i) a dramatic decline in total daylight overdrafts and (ii) reduced the Federal Reserve's intra-day credit risk and its liability as guarantor of all Fedwire transactions. These two effects reduced the subsidy accruing from the government-operated payments system.⁸⁶

Following the 2008 financial crisis, the United States has not been alone in granting large subsidies to the biggest banks.⁸⁷ Studies estimate the crisis has prompted global spending of more than \$11 trillion of assistance to financial institutions, and more than \$6 trillion on economic stimu-

⁸⁴ Bank Compliance Guide, 2009 WL 2798952 (C.C.H.).

⁸⁵ Under these Prompt Corrective Action (PCA) provisions, as an institution's capital position declines, the appropriate bank regulator is required to increase the severity of its actions.

⁸⁶ *Id.*

⁸⁷ Andrew Haldane, Speech at Institute of Economic Affairs' 22nd Annual Series, The 2012 Beesley Lectures: On Being the Right Size (Oct. 25, 2012) (arguing that by 2009, the 29 largest banks in the world obtained in annual subsidies more than \$700 billion); Ueda et al., *supra* note 3 (arguing that in many countries financial institutions enjoyed a funding cost advantage of 60 basis points in 2007, and 80 basis points in 2009).

lus programs.⁸⁸ The bulk of these programs were in the United States, United Kingdom, and other European countries.⁸⁹ In the U.K., for example, experts calculated that in 2007-2009, an annual subsidy for the top five banks totaled at more than £50 billion.⁹⁰ That support included direct subsidies, extraordinary liquidity measures, occasional liquidity support, a deposit guarantee scheme,⁹¹ and implicit subsidies, which correlated with market expectations of government support.⁹² And while some of that support is scheduled to end in the near future, some form of central bank liquidity insurance and deposit guarantee scheme will likely remain.⁹³

Deciding to give subsidies to banks was part of the way several governments attempted to deal with the 2008 crisis. In order to maintain financial stability in the United States following the crisis, both President Bush and President Obama decided to rely on the Keynesian theory. The Presidents pushed for Congress to pass significant stimulus bills focused on injecting large amounts of money into the economy.⁹⁴ Their efforts were successful and support was provided to financial institutions that totaled at approximately \$1.525 trillion. The funds were distributed through the Troubled Asset Relief Program (TARP) and the Stimulus Plan, even though it was difficult to isolate empirical data on the effects of government spending from other economic factors.⁹⁵ And while government payments to bailout the biggest banks during the crisis are not the same as the forward-looking value of any implicit and explicit subsidies, such bailout payments can be viewed as a measure of the extent, to which banks will continue to benefit from the government subsidies. This might have been why Americans so strongly opposed the banks' bailout. That strong opposition has led

⁸⁸ See Ivry, *supra* note 22.

⁸⁹ See Wilmarth, *supra* note 27, at 708.

⁹⁰ Andrew Haldane, Comments by Mr. Andrew G. Haldane, Executive Director, Financial Stability, Bank of England, at the Institute of Regulation & Risk, Hong Kong: The \$100 Billion Question (Mar. 30, 2010).

⁹¹ This scheme is known as the Financial Services Compensation Scheme, which is mainly industry-funded. See *Assessing State Support to the UK Banking Sector*, OXERA 2 (Mar. 2011), <http://www.oxera.com/Oxera/media/Oxera/downloads/reports/Assessing-state-support-to-the-UK-banking-sector.pdf?ext=.pdf> (prepared for The Royal Bank of Scotland) [hereinafter "Oxera Report"].

⁹² *Id.* (calculating annual £5.9 billion subsidies for a £7 trillion assets financial system and volatility of about 4%).

⁹³ *Id.*

⁹⁴ J.D. Foster, *Keynesian Fiscal Stimulus Policies Stimulate Debt-Not the Economy*, HERITAGE FOUND. (Jul. 27, 2009), <http://www.heritage.org/research/reports/2009/07/keynesian-fiscal-stimulus-policies-stimulate-debt-not-the-economy>.

⁹⁵ "If the funds committed under TARP have an intended purpose and are not merely no-strings-attached subsidies to financial institutions . . . then it seems essential for Treasury to monitor whether the funds are used for those intended purposes . . . Treasury cannot simply trust that the financial institutions will act in the desired ways; it must verify." See M.P. Taylor & Nena Groskind, 01-05-09 CR. UNION REG. INSIDER 1 (discussing reports prepared by the Government Accountability Office and the congressional panel overseeing the program).

many government officials to promise to never again rescue a large failing bank; in fact, the Dodd-Frank Act was meant to end the TBTF problem.

Despite attempts to resolve the megabanks' subsidies issue, the benefits given to TBTF banks are still so significant that even the former Chairman of the Federal Reserve, Ben Bernanke, admitted there is a problem. Former Chairman Bernanke conceded that it is only because of their size that certain banks get such subsidies.⁹⁶ Similarly, rating agencies, which could not ignore the benefits such banks receive, have stated in reports that if not for an implicit government guarantee, debt sold by some of the biggest banks would have fallen to junk status.⁹⁷ Consequently, in 2012–2013 the attention that the TBTF problem received resulted not just in media reports, but also in several suggested solutions on how to deal with the TBTF problem.⁹⁸ Among such solutions is the Brown–Vitter 2013 bill, which uses the “subsidy” issue as one of its key premises, as well as the primary rationale for other regulatory actions.⁹⁹ Many view this legislation, which requires megabanks to borrow less, as a legitimate response to the problem.¹⁰⁰

In addition, the focus on the TBTF banks' subsidies pushed the Senate to unanimously hold that the Government Accountability Office (GAO) would conduct a study of the subsidy allegedly enjoyed by the biggest financial institutions.¹⁰¹ In response, on November 14, 2013, the GAO issued the first, and on July 31, 2014, the second of two highly anticipated reports that detail the benefits that big banks receive because they are viewed as TBTF. The first report suggested that the government was dragging its feet on rules required by the Dodd-Frank Act, which was intended to give remedy to the problem, mainly by limiting the aid the government can provide

⁹⁶ See Anat R. Admati, *We're All Still Hostages to the Big Banks*, N.Y. TIMES, Aug. 25, 2013, at A23, available at http://www.nytimes.com/2013/08/26/opinion/were-all-still-hostages-to-the-big-banks.html?hp&_r=1&.

⁹⁷ See chart, *Rescued from Junk*, BLOOMBERG (Mar. 27, 2013), <http://www.bloomberg.com/image/iuhcmWgTWFWo.jpg>.

⁹⁸ See *infra* Part IV.

⁹⁹ See Sherrod Brown, *Vitter Unveil Legislation That Would End “Too Big To Fail” Policies* (Apr. 24, 2013), <http://www.brown.senate.gov/newsroom/press/release/brown-vitter-unveil-legislation-that-would-end-too-big-to-fail-policies>.

¹⁰⁰ Shahien Nasiripour, *Andy Haldane Praises Brown-Vitter Bill To End ‘Too Big To Fail’*, HUFFINGTON POST (May 17, 2013), http://www.huffingtonpost.com/2013/05/16/andy-haldane-brown-vitter_n_3289168.html; Simon Johnson, *Brown-Vitter Rearranges Financial-Reform Battlefield*, BLOOMBERG (Apr. 28, 2013), <http://www.bloomberg.com/news/2013-04-28/brown-vitter-rearranges-financial-reform-battlefield.html>.

¹⁰¹ Karen Shaw Petrou, *To End Big-Bank Subsidies, Fix the FDIC's ‘Off’ Switch*, AM. BANKER (May 21, 2013, 3:00 PM), <http://www.americanbanker.com/bankthink/to-end-big-bank-subsidies-fix-the-fdic-off-switch-1059287-1.html>. See also Letter from U.S. Senators David Vitter (R-La.) and Sherrod Brown (D-Ohio) to the Gene L. Dodaro, Comptroller General of the United States and Director of the Government Accountability Office (Jan. 1, 2013), <http://www.vitter.senate.gov/newsroom/press/vitter-to-gao-open-books-of-too-big-to-fail-megabanks> (arguing that the GAO to conduct a study of the economic benefits that the “too-big-to-fail” megabanks receive.).

to the megabanks in case of an emergency. According to the first GAO report, the Dodd-Frank Act “contains provisions that aim to modify the scope of federal safety nets, restrict future government support and strengthen regulatory oversight for the banking sector, but implementation is incomplete and the effectiveness of some provisions remains uncertain.” Nevertheless, according to the second GAO report, while evidence points at lower funding costs to bigger banks during the financial crisis, there is mixed evidence of such advantages in recent years.¹⁰²

While the concept of massive subsidies to megabanks is controversial, there are legitimate reasons for providing at least some government support to megabanks. Indeed, the main reason for government support is to protect the financial system from shocks that might trigger a systemic event.¹⁰³ Professor Schwarcz of Duke University defines systemic risk as “the risk that (i) an economic shock such as market or institutional failure triggers (through a panic or otherwise) either (X) the failure of a chain of markets or institutions or (Y) a chain of significant losses to financial institutions, (ii) resulting in increases in the cost of capital or decreases in its availability, often evidenced by substantial financial-market price volatility.”¹⁰⁴ In general, it appears that the literature recognizes certain types of contagion channels by which shocks are transmitted through the system.¹⁰⁵ These include the liability mechanism, which explains how by transforming short-term liabilities into long-term assets, banks are exposed to the risk that even a rather small shock to the system can result in a loss of confidence and a run on the bank. Such a situation makes it difficult for banks to even borrow money from other financial institutions. These contagion channels also include the asset mechanism, which focuses on coordinated fire sales of assets that result in further decreasing the prices of assets held by other banks.¹⁰⁶ According to certain experts, in 2008 the liquidity shocks that the financial industry dealt with were so radical,¹⁰⁷ that governments had no choice but to inject great amounts of cash into liquidity-strapped financial institutions.¹⁰⁸

¹⁰² *Id.*

¹⁰³ See the Oxera Report, *supra* note 91, at 3.

¹⁰⁴ See Steven L. Schwarcz, *Systemic Risk*, 97 GEO. L.J. 193, 204 (2008).

¹⁰⁵ See the Oxera Report, *supra* note 91, at 3.

¹⁰⁶ For example, the risk for a “run on the bank,” which results from the depositors demanding the return of their funds at any given point in time, and the more demands there are the less SIFIs can accommodate these requests, and if SIFIs cannot liquidate investments fast enough to obtain the money demanded they are in trouble. See Karl S. Okamoto, *After the Bailout: Regulating Systemic Moral Hazard*, 57 UCLA L. REV. 183, 193 (2009).

¹⁰⁷ See, e.g., Robin Sidel, et al., *WaMu Is Seized, Sold Off to J.P. Morgan in Largest Failure in U.S. Banking History*, WALL ST. J., Sept. 26, 2008, at A1 (“The collapse . . . was triggered by a wave of deposit withdrawals . . .”).

¹⁰⁸ Nevertheless, certain studies have argued, from a conceptual perspective, that such a support would have been provided to protect the financial system from systemic shocks regardless of the market

Despite the above, and the discussed neoclassical economics' theories of subsidies, it is difficult to argue that government support of megabanks, especially in the last few years, has been the result of a carefully structured, well-researched policy. It is also difficult to argue that such subsidies reflect the public's preferences concerning this issue.¹⁰⁹ Moreover, several years after the Stimulus Plan was initiated, many still argue that it failed to produce a minimal Keynesian multiplier.¹¹⁰ And what made things even worse were recent media reports reporting on massive subsidies given to major U.S. banks, which sent shockwaves across the markets.¹¹¹

2. Calculating the Subsidies

But the media only put the TBTF issue at the center of the attention. It did not create it. Indeed, in the years following the financial crisis, several scholars and researchers studied the issue and argued that TBTF subsidies exist, and took it upon themselves to calculate the subsidies' scope. They used different methodologies to demonstrate that the most significant implicit subsidy stems from market perception that the government will not allow the biggest banks to fail—that they are “too-big-to-fail”—enabling them to borrow at lower interest rates, and making them safe in investors'

structure—one with many small banks or one with a few large banks. *See, e.g.*, Oxera Report, *supra* note 91, at 5–6.

¹⁰⁹ A recent poll found strong opposition to federal bailouts of financial institutions. *See* PEW RESEARCH CTR., *Possible Negatives For Candidates: Vote For Bank Bailout, Palin Support* (Oct. 6, 2010), <http://www.people-press.org/2010/10/06/possible-negatives-for-candidates-vote-for-bank-bailout-palin-support/>. In addition, the 2008 financial crisis and the financial support given to the largest banks resulted in the creation of the Occupy Wall Street (OWS) movement. For the origin of OWS see Matt Sledge, *Reawakening The Radical Imagination: The Origins Of Occupy Wall Street*, HUFFINGTON POST (Nov. 10, 2011, 2:21PM), http://www.huffingtonpost.com/2011/11/10/occupy-wall-street-origins_n_1083977.html. *See also* *Americans still angry at Wall St over Lehman*, FIN24, REUTERS (Sept. 15, 2013), <http://m.news24.com/fin24/Companies/Financial-Services/Americans-still-angry-at-Wall-St-over-Lehman-20130915> (discussing a recent Reuters/Ipsos poll it is stated that “[a]s many as 44% of those polled believe the government should not have bailed out financial institutions Fifty-three percent think not enough was done to prosecute bankers . . . [and] as many as 30% of Americans believe Wall Street banks and traders do not help the economy grow and create jobs.”). *See also* Thomas Hoeing, *Stop Subsidizing Wall Street*, WASH. TIMES (Apr. 1, 2013), <http://www.occupy.com/article/stop-subsidizing-wall-street> (“While trading and investment activities are vital parts of the financial services industry, there is no economic or social rationale for protecting and subsidizing them.”)

¹¹⁰ *See, e.g., Id*; Mulligan *supra* note 66; *The 2009 Stimulus Package: Two Years Later: Hearing Before the House Comm. on Oversight and Gov't Reform, Subcomm. on Reg. Aff.*, 112th Cong. 6 (2011) (statement of John B. Taylor) <http://www.gpo.gov/fdsys/pkg/CHRG-112hhrg67173/pdf/CHRG-112hhrg67173.pdf>; *see generally* T. RANDOLPH BEARD, ET AL., *Can Government Spending Get America Working Again? An Empirical Investigation*, 31 PHOENIX CTR. POL'Y BULL. (2011), available at www.Phoenix-Center.org/policybulletin/PCPB31final.pdf (finding “government spending has zero effect on private-sector job creation”).

¹¹¹ *See* Ivry, *supra* note 23.

and rating agencies' eyes.¹¹²

First, showing that parties transacting with TBTF banks agree to accept lower returns because they believe these banks will never fail, Virginia Tech professor Deniz Anginer calculated that this perception totaled at a \$102 billion subsidy. Specifically, professor Anginer calculated that the subsidy received by the six biggest U.S. banks is mainly the result of bondholders accepting lower returns, believing that these banks are safer because the government would bail them out if needed. Professor Anginer calculated that between 2009–2011 the subsidy included \$37.3 billion in 2009 after TARP, \$29.9 billion in 2010, and \$14.6 billion in 2011.¹¹³ Then professor Anginer added to his calculation (i) data on publicly known tax breaks that the six biggest banks received, (ii) additional income from the Federal Reserve's mortgage-bond purchases, and (iii) the interest the Federal Reserve paid for bank deposits, all totaling at \$102 billion.¹¹⁴

Second, also focusing on investors' expectations of government support, several scholars demonstrated that the expectations were embedded in the credit spreads on bonds issued by major banks.¹¹⁵ They computed the credit spread on each bank's bonds as the difference between the yield on its bonds and the corresponding maturity-matched Treasury bond. The study showed a noticeable negative relationship between spreads and systemic importance. Specifically, it showed that size—as a factor contributing to systemic importance—has a negative effect on spreads, and that for systemically important banks, spreads are less sensitive to risk. The study assessed the volume of the subsidies by (i) quantifying the value of the funding subsidy in basis points; (ii) using the basis point to calculate a dollar value of the banks' benefit by multiplying the annual reduction funding costs by the bank's total uninsured liabilities. This calculation totaled at an annual funding cost advantage of 20 basis points from 1990–2010, valued at \$20 billion per year, except for 2009, during which the cost advantage was higher than 120 basis points, and totaled over \$150 billion.¹¹⁶

Third, demonstrating that the biggest banks receive a discount on their borrowing costs, two IMF economists published in Bloomberg the results of a study, which received wide coverage.¹¹⁷ They concluded that the big-

¹¹² One of the top rating agencies, S&P, even published predictions foreseeing that the U.S. government assistance to the biggest banks will become a permanent factor in forming banks' credit. See S&P Report, *supra* note 1.

¹¹³ See Ivry, *supra* note 22.

¹¹⁴ *Id.*

¹¹⁵ See Warburton et al., *supra* note 6.

¹¹⁶ *Id.* at 4.

¹¹⁷ See generally Eric Zuesse, *This Year's Subsidy to Wall Street = the Amount of This Year's Sequester Cuts* (Feb. 28, 2013), <http://www.washingtonsblog.com/2013/02/this-years-subsidy-to-wall-street-the-amount-of-this-years-sequester-cuts.html>; Eric Zuesse, *Bloomberg: US Subsidy to Wall Street = the Amount of Sequester Cuts; It's \$83 Billion in 2013* (10:23 am, Feb. 27 2013), <http://truth-out.org/buzzflash/commentary/bloomberg-us-subsidy-to-wall-street-the-amount-of-sequester-cuts-it-s->

gest banks received substantial rewards because the bigger they are, the more disastrous their failure would be and the more certain they can be of a taxpayer bailout. Accordingly, the ten U.S. banks that the research focused on received a 0.8 percentage point discount, which lowered their borrowing costs on all their liabilities, including bonds and customer deposits. The value of that discount totaled at an \$83 billion subsidy per year. The research also showed that the top five banks accounted for \$64 billion of the subsidy's amount, which roughly equals to these banks' annual profits.

Fourth, a study interpreting different investments options' preferences shows that the preferences result from an implicit government guarantee to the biggest banks. Specifically, the study showed that a long position in the stock portfolio of the biggest U.S. banks and a short position in the stock portfolio of smaller banks underperforms an equally risky portfolio of all nonbank stocks and government and corporate bonds by approximately eight percent per year over thirty-nine years. This difference is the result of an implicit government guarantee to the biggest banks.¹¹⁸

Fifth, exploring the differences in funding costs between the biggest banks and all other banks, a study showed that credit default swap (CDS) spreads were reduced by twenty-three basis points precrisis and fifty-six basis points postcrisis due to subsidies granted to the twenty biggest banks.¹¹⁹ The study researched the differences in funding costs in two stages for the period November 2001 through May 2010. The authors first calculated the difference between an observed CDS spread to an estimated "fair market" CDS spread using data from the equities market for all banks in the database. The authors then paralleled the observed and estimated fair market CDS spreads between the biggest banks and smaller ones. The database used included information on the twenty biggest and sixty-three other banks that have CDS spreads and other publicly available data.¹²⁰

83-billion-in-2013/17828-bloomberg-us-subsidy-to-wall-street-the-amount-of-sequester-cuts-it-s-83-billion-in-2013; Linette Lopez, *Elizabeth Warren Grilled Ben Bernanke On The Subsidy For 'Too Big To Fail' Banks* (4:06 pm, Feb. 26 2013), <http://www.businessinsider.com/elizabeth-warren-on-bank-subsidy-2013-2>.

¹¹⁸ Ghandi Priyank & Hanno Lustig, *Size Anomalies in U.S. Bank Stock Returns: A Fiscal Explanation*, NAT'L BUREAU OF ECON. RES. (Dec. 28, 2010), available at <http://www.nber.org/papers/w16553.pdf>. The authors created an equilibrium model of asset prices, adjusted it to match the subsidy, and decomposed it into a 3.10 percent subsidy to the biggest banks and a 3.25 percent disaster tax on the smallest banks. The authors then multiplied the subsidy by the average market cap of the biggest U.S. banks to calculate the annual subsidy given to those banks, which totaled at \$4.71 billion per bank in 2005 dollars.

¹¹⁹ Li Zan, Shisheng Qu & Jing Zhang, *Quantifying the Value of Implicit Government Guarantees for Large Financial Institutions*, Modeling Methodology, MOODY'S ANALYTICS (Jan. 14, 2011), <http://www.moodyanalytics.com/~media/Insight/Quantitative-Research/Credit-Valuation/2011/2011-14-01-Quantifying-the-Value-of-Implicit-Government-Guarantees-for-Large-Financial-Institutions-20110114.ashx>.

¹²⁰ *Id.* Also focusing on CDS spreads, a different study total implicit bank subsidies of \$121.17 billion from 2007 through 2010. See also Tsemlidakis et al., *supra* note 23.

Sixth, researching how predictions of government intervention during a financial crash lowered the price of financial sector collapse insurance, a study estimated that these predictions were valued at over \$150 billion.¹²¹ Specifically, measuring the price of a financial sector collapse insurance by index put options on the sector between January 2003 and June 2009, a study found that the public was not initially satisfied just by TARP, knowing that the funds would be used to purchase preferred shares that would dilute shareholders. However, once government plans were announced concerning the purchase of toxic assets, the general bailout guarantee became valuable. The study used the difference between (i) the price of a basket of put options on specific banks, and (ii) the price of a put option on the financial sector index as the basis for calculating the size of a general bailout guarantee to the financial sector. The authors used an asset pricing model with infrequent events to research the effect of industry-wide bailout guarantees on option prices. The model can explain financial sector joint stock and option moments only when it incorporates a government bailout guarantee of the financial industry. The model's parameters helped determine the impact of the bailout guarantee on a bank's expected return, and cost of capital in addition to the overall dollar size of the federal subsidy.¹²²

Seventh, focusing on market perception of risk of the biggest U.S. banks, a study calculated the difference in interest rates offered on uninsured and insured money market deposit accounts at banks in the period between 2005 and 2010.¹²³ The study used money market deposit accounts with a (i) minimum deposit of \$100,000 as their proxy for uninsured deposits, and (ii) \$25,000 as their proxy for insured deposits, and calculated the difference in the interest rates offered on those accounts. The authors interpreted the differences as the market perception of risk of the banks, and calculated the difference-in-difference of those rates between big and small banks. They found that bigger banks paid a lower risk premium than smaller banks,¹²⁴ and concluded that an unexplained residual difference in risky deposit rates between the biggest and the smallest banks exists, as the biggest banks paid up to 45 basis points less in risk premiums for uninsured deposits.¹²⁵

Finally, using on FDIC data on banks, a study calculated the difference between (i) the average quarterly cost of funds for banks that held assets worth less than \$100 billion and (ii) the average quarterly cost of funds for

¹²¹ See Bryan Kelly et al., *supra* note 23.

¹²² *Id.*

¹²³ See Jacewitz, *supra* note 8.

¹²⁴ *Id.* The study also used Ordinary Least-Squares (OLS) Regressions, a generalized linear modeling technique that may be used to model a single response variable which has been recorded on at least an interval scale, to explore what part of the lower risk premiums that were paid by the biggest banks could not be explained by other potential noticeable differences in risk across those banks.

¹²⁵ *Id.*

banks with assets worth more than \$100 billion for the periods (a) 2000–2007, and (b) the last quarter of 2008 through the first quarter of 2009. The study then calculated the difference-in-differences between the two time periods and concluded that a major subsidy exists.¹²⁶ This subsidy is a funding cost advantage of twenty-nine basis points for banks with more than \$100 billion in assets for the first period, which increased to seventy-eight basis points for the second period. The increase—of forty-nine basis points—represents an annual subsidy of \$34 billion to eighteen banks with more than \$100 billion in assets in the first quarter of 2009.¹²⁷

On top of the general implicit TBTF subsidy calculated above, based on published data, the biggest U.S. banks have arguably benefited from three other sources of financial benefits: (i) deposit insurance, which allows banks to lower their risk profile and thus function with less capital and a lower cost of funds, without paying a fair “market premium” for the insurance;¹²⁸ (ii) the discount window, which provides credit to solvent but illiquid banks even when other sources of credit may not be available allowing them to fund riskier and less-liquid asset portfolios at a lower cost and on a much larger scale;¹²⁹ and (iii) access to the Federal Reserve’s large-dollar electronic payments system, through which banks with reserve or clearing accounts at a Federal Reserve Bank may transfer balances to other institutions with similar accounts. Because such transfers are “guaranteed” when initiated, the Federal Reserve assumes the intra-day credit risk that certain banks will not have enough funds to discharge obligations. When banks that incur intra-day overdrafts do not pay a market rate for such government protection they essentially get a government-provided financial subsidy.¹³⁰

In addition, it appears that TBTF subsidies are not only arguably massive in volume, but also vital for the banks’ functioning.¹³¹ A recent report estimated that two of the biggest financial institutions in the U.S.—Bank of America Corp and Citigroup Inc.—were much more dependent on governmental backstops than similarly sized competitors and that their profits would have been negative if not for the government subsidies.¹³² The report stated that “[f]inancial sector CEOs have relied on taxpayer support. They have benefitted from express taxpayer bailouts as well as secret “back door” deals. They continue to lead companies that seem to make profit but

¹²⁶ See Baker & McArthur, *supra* note 23. (The study showed that while there could have been other explanations, after adjusting for such potential explanations, the spread between the two groups of banks potentially increased by 9 basis points following the crisis. This result, the study argues, represents an annual TBTF subsidy of \$6.3 billion, which may only be temporary.)

¹²⁷ *Id.*

¹²⁸ James, A. Wilcox & , Joe Peek, *Safety Net Subsidies in Banking: Decline, Resurgence, and Prospects*, June 24, 2001, <http://www.haas.berkeley.edu/groups/finance/SNS—v2.1—062401.pdf>.

¹²⁹ *Id.*

¹³⁰ *Id.*

¹³¹ See The Motley Fool, *supra* note 24; Robert Johnson, *supra* note 7, at 9.

¹³² See Robert Johnson, *supra* note 7, at 9.

actually only thrive because of government subsidies and taxpayer support.”¹³³ Likewise, a 2012 study demonstrated that the subsidies that the biggest U.S. banks received were roughly equivalent to their profits during the four quarters prior to June 2012.¹³⁴

3. *Big Banks v. TBTF Subsidies*

Despite former Chairman Bernanke’s statements, experts’ predictions, and the various studies calculating massive subsidies, as described above, not everyone agrees that the biggest banks receive massive subsidies, or any unique benefits.¹³⁵ First, financial service organizations argue that many of the TBTF subsidies’ estimates were based on a flawed methodology, and unreliable financial data that was collected before the passage of the Dodd-Frank Act.¹³⁶ But it seems unreasonable that so many different TBTF subsidies’ estimates, which all point at massive combined financial advantages and subsidies¹³⁷ for the biggest U.S. banks are all so off. Indeed, after estimates of the subsidies’ size were published in the media,¹³⁸ shocking the financial markets, many economists attempted to assess the subsidies’ size independently using different methodologies, and many found massive numbers too.¹³⁹

Second, financial service organizations and certain commentators argue that due to recent regulation, including the Dodd-Frank Act, the advantage of “systemically important” fiscal institutions was reduced, or even turned into a disadvantage,¹⁴⁰ and that consequently there is no need for further regulation.¹⁴¹ Specifically, several banks, including Goldman Sachs,

¹³³ *Id.*

¹³⁴ Charles W. Murdock, *supra*, note 25, at 505.

¹³⁵ See, e.g., Press Release, Financial Services Forum et al., *Financial Industry Addresses Alleged Large Bank Subsidy* 1 (Mar. 11, 2013), http://images.politico.com/global/2013/03/10/financial_industry_addresses_alleged_large_bank_subsidy_11_march_13.html.

¹³⁶ *Id.*

¹³⁷ See *Top Banking Analyst: Subsidies to Giant Banks Exceed \$780 Billion Dollars Per Year*, WASHINGTONS BLOG (Mar. 13, 2013), <http://www.washingtonsblog.com/2013/03/top-banking-analyst-subsidies-to-giant-banks-exceed-780-billion-year.html>. The most extreme estimate of subsidies included (i) 360 billion in Federal Reserve subsidies; (ii) \$120 billion in federal deposit insurance; (iii) \$100 billion in government-guaranteed loans; (iv) at least \$100 billion in monopolistic advantages in the secondary market for home mortgages; and (v) more than \$100 billion in fees in the over-the-counter (OTC) derivative market. *Id.*

¹³⁸ See Ivry, *supra* note 22.

¹³⁹ See, e.g., Baker et al., *supra* note 23; Warburton, et al., *supra* note 6; Kelly, et al., *supra* note 23; Tsemelidakis, et al., *supra* note 23 (arguing that wealth transfers to investors reached \$365 billion in 2007–2010).

¹⁴⁰ See Stogin et al. *supra* note 13 (arguing that the biggest U.S. banks enjoyed a funding advantage of 6 basis points on average between 1999–2007 that increased during the crisis, but then reversed to a 10 basis points disadvantage).

¹⁴¹ Alison Fitzgerald, *Banks Seek To Sway Critical GAO Report*, FORBES (Jan. 17, 2014 6:00AM),

have released reports that argue that any cost advantage they had during the crisis has shrunk with the passage of the Dodd-Frank Act,¹⁴² with Michel Araten of JPMorgan particularly reasoning that the TBTF subsidy's shrinking resulted in about 18 basis points. Araten also contended that this basis would likely get smaller because of new regulations that will result in the liquidation rather than the bailing out of major banks in future crises.¹⁴³

Despite the megabanks' attempts to prove that their advantages would become insignificant, they have only been able to point to one independent academic research team that has found that the megabanks market advantages diminished because of Dodd-Frank rules. Professors Ken Cyree and Bhanu Balasubramanian concluded that the Dodd-Frank Act has effectively reduced but did not eliminate too-big-to-fail discounts.¹⁴⁴ Moreover, while the Dodd-Frank Act does attempt to put a stop to the TBTF taxpayer-funded benefits¹⁴⁵ by forcing SIFIs to internalize the costs and risks of their activities¹⁴⁶ and by prohibiting the Federal Reserve from making extraordinary loans to them, it has not yet offered a real solution to end the problem.¹⁴⁷ The Dodd-Frank Act also does not prohibit the government from giving financial support framed in a more general fashion.¹⁴⁸ As a result, government implicit and explicit subsidies and transfers from taxpayers to SIFIs and their shareholders continue.¹⁴⁹

Third, financial service organizations and research teams offer a wide array of additional arguments as to why no TBTF subsidies actually exist.¹⁵⁰ For example, JPMorgan's Michel Araten argued that financial market data already discounts the notion of government support for mega-

available at <http://www.forbes.com/sites/centerforpublicintegrity/2014/01/17/banks-seek-to-sway-critical-gao-report/>.

¹⁴² See Financial Services Forum, *supra* note 135.

¹⁴³ Michel Araten & Christopher M Turner, *Understanding the Funding Cost Differences between Global Systemically Important Banks (G-SIBs) and Non-G-SIBs in the United States* (Mar. 11, 2012) (unpublished manuscript), available at <http://ssrn.com/abstract=2226939>.

¹⁴⁴ Ken Cyree & Bhanu Balasubramanian, *Has Market Discipline on Banks Improved after the Dodd-Frank Act?*, (Nov. 2, 2013) (unpublished manuscript), available at <http://ssrn.com/abstract=2349042>.

¹⁴⁵ See Kaper, *supra* note 26 (reporting that President Obama declared, "Because of this law . . . [t]here will be no more taxpayer-funded bailouts. Period.").

¹⁴⁶ See Wilmarth, *supra* note 27, at 713.

¹⁴⁷ See generally Lawrence L. Evans, U.S. GOV'T ACCOUNTABILITY OFFICE, GAO-14-174T, GOVERNMENT SUPPORT FOR BANK HOLDING COMPANIES STATUTORY CHANGES TO LIMIT FUTURE SUPPORT ARE NOT YET FULLY IMPLEMENTED (Jan. 8, 2014), available at http://www.banking.senate.gov/public/index.cfm?FuseAction=Hearings.Testimony&Hearing_ID=88d4aa7d-32c3-4bb1-8ccb-a0c917bfb2e7&Witness_ID=0a2a4210-c333-4bfa-a896-0e6a37825657.

¹⁴⁸ See Skeel, *supra* note 4.

¹⁴⁹ See Bloomberg, *supra* note 7.

¹⁵⁰ See, e.g., Michael Araten, *Credit Ratings as Indicators of Implicit Government Support for Global Systemically Important Banks*, SOC. SC. RESEARCH NETWORK (May 31, 2013), available at <http://ssrn.com/abstract=2272800>.

banks.¹⁵¹ Similarly, the Clearing House Association, which has an advocacy and research division as well, launched a series of working papers on touting the value of big banks. It released a study examining what it called “10 Myths” about systemically important banks, and supported the work of Professor Randall Kroszner of the University of Chicago, that suggests that large companies in every industry have lower costs than smaller ones and that this is not related to subsidies or unique to banking.¹⁵² However, even if the largest nonbanks and nonfinancial corporations in many industries do have lower costs of credit than their smaller peers, a recent Federal Reserve Bank of New York study has shown, using information from bonds issued over the past two decades, that a comparison across the largest (i) banks, (ii) nonbanks, (iii) and nonfinancial corporations, reveals that the largest banks have a relatively larger cost advantage vis-à-vis their smaller peers. This difference is consistent with the theory that investors believe some banks are TBTF.¹⁵³

Finally, as mentioned previously, certain commentators argue that scale economies in banking exist,¹⁵⁴ and benefit the entire society, making the megabanks’ situation a unique one, which justifies government financial support.¹⁵⁵ Put differently, megabanks argue that their added value that looks like a TBTF subsidy really is not, but reflects their economies of scale and scope, which enable them to create benefits that are passed on to their customers and investors, and lower the costs of finance for society.¹⁵⁶

However, economies of scale arguments as justifications for megabanks are problematic for several reasons. First, it is still debatable whether

¹⁵¹ *Id.* (arguing that the market implied ratings for small banks are closer to the issuer ratings, while those for big banks track the standalone, unsupported ratings more closely than they do the ratings, which have built-in implicit government support).

¹⁵² See Fitzgerald, *supra* note 18; see generally Randall S. Kroszner, *A Review of Bank Funding Cost Differentials*, SOC. SC. RESEARCH NETWORK (Nov. 16, 2013), available at <http://faculty.chicagobooth.edu/randall.kroszner/research/pdf/Kroszner%20Bank%20Funding%20Cost%20Difs%20Nov%202013.pdf>.

¹⁵³ See Santos, *supra* note 3 (“The largest banks that issue bonds rated double-A and single-A benefit from a discount (relative to their smaller peers) that is larger by 92 and 16 basis points, respectively, than the discount that the largest nonbank financials that issue bonds with those same ratings enjoy (relative to their smaller peers), though the difference is only statistically significant in the former case. When compared to the largest nonfinancial corporations, the largest banks that issue bonds rated double-A and single-A benefit from an additional discount of 53 and 50 basis points, respectively, though only the latter difference is statistically significant.”).

¹⁵⁴ See *supra* all sources at note 15.

¹⁵⁵ Loretta J. Mester, *Scale Economies in Banking and Financial Regulatory Reform*, FED. RES. BANK OF MINNEAPOLIS, THE REGION (Sept. 1, 2010), available at http://www.minneapolisfed.org/publications_papers/pub_display.cfm?id=4535#_ftnref12; Joseph P. Hughes & Loretta Mester, *Who Said Large Banks Don't Experience Scale Economies? Evidence from a Risk-Return-Driven Cost Function*, (Fed. Res. Bank of Phila., Working Paper 13-13, 2013), available at <http://ssrn.com/abstract=2256059> (finding evidence of economies of scale for banks with more than \$100 billion in assets, after controlling for TBTF-related funding advantages.).

¹⁵⁶ Schildbach, *Universal Banks*, *supra* note 17.

the biggest banks actually do better due to economies of scale advantages. Indeed, not only have certain studies concluded that no true economies of scale exist even though megabanks do have unique business mixes and geographic footprints,¹⁵⁷ but some studies have showed that what might appear to be economies of scale is really TBTF subsidies. Specifically, studies have shown that when examined from a standard model of bank production that does not control for TBTF funding cost advantages, scale economies were found, but, when examined under an enhanced model that adjusts the price of debt using implicit funding subsidies, no evidence of scale economies was found.¹⁵⁸ Second, even among those that argue for the existence of economies of scale, it is not clear what is the magic cutoff size of a bank should be in order for such a bank to enjoy this advantage.¹⁵⁹ Third, advocating for bigger banks because of economies of scale is not recommended. Recent studies have clearly shown that the biggest banks are much more likely to take additional, excessive risks, and relying on the government to save them if needed.¹⁶⁰ Thus, even if according to professors Hughes and Mester evidence of economies of scale for banks with more than \$100 billion in assets do exist, and such banks might provide some cost advantages to the economy, they are also the ones most likely to jeopardize the soundness of the financial system.¹⁶¹ Large banks are simply riskier than smaller banks and create more systemic risk, especially when they have insufficient capital or unstable funding. Fourth, bigger does not necessarily mean better. Several recent studies have suggested that small

¹⁵⁷ Harvard Winters, *Where Are the Economies of Scale We Were Promised?*, AM. BANKER (June 6, 2013, 3:00 PM), available at <http://www.americanbanker.com/bankthink/where-are-the-economies-of-scale-we-were-promised-1059663-1.html> (“[O]f the 25 U.S. depository institutions with more than \$25 billion of assets, . . . [l]ine these institutions up in size order and you’ll see that despite the huge difference in assets between the top four and everyone else, there’s no . . . advantage to being big. The \$65-billion asset Comerica (CMA) has essentially the same overhead/AA ratio (2.66%) as JPMorgan Chase (2.65%)” [worth \$2.39 trillion at that time].).

¹⁵⁸ Richard Davies & Belinda Tracey, *Too Big to Be efficient? The Impact of Too big to Fail factors on Scale Economies for Banks*, BANK OF ENGLAND, 2012, https://www.tilburguniversity.edu/upload/cdf58f26-955d-4d0e-89ef-76ef7e86939c_daviestracey.pdf.

¹⁵⁹ “Early studies found that economies of scale in banks disappear after the first \$50 billion in assets . . . Recent studies show that economies of scale also exist for larger banks, and are \$16–\$45 billion per year for the U.S. banking system . . . This is about 0.2% of the \$20 trillion size of the US banking system. But about a third of these economies realises in riskier capital-market activities of banks. So the risk-adjusted economies of scale may be less than 0.2%. (Note also that, from the perspective of economic efficiency, the economies of scale pale in comparison to the estimated \$6–\$12 trillion cost of the recent financial crisis. . .) Overall, the too-big-to-fail subsidies, at 0.25% of assets, appear more important in driving bank size than the economies of scale, at less than 0.2% of assets.” See Lev Ratnovski & Luc Laeven, *Hui Tong, Are Banks Too Large?*, IMF (May 31, 2014), available at <http://blog-imfdirect.imf.org/2014/05/14/are-banks-too-large-maybe-maybe-not/>.

¹⁶⁰ See Afonso, Santos & Traina, *supra* note 3.

¹⁶¹ See Hughes & Mester, *supra* note 155, at 32 (“We do not know if the benefits of large size outweigh the potential costs in terms of systemic risk that large scale may impose on the financial system.”).

banks can be more efficient than their large counterparts, and Harvard University's Professor Mark Roe has analyzed the danger with any implicit TBTF subsidy pushing firms to be too-big-to-manage and compared this effect to a corporate poison pill, which disrupts the actions of both outsiders and insiders.¹⁶²

After analyzing all of the above regarding the scope of the arguable TBTF subsidies, it is evident that TBTF subsidies do exist, and that no other theory can explain and justify all the related anomalies, studies' results, and the behavior of various financial markets' participants' behavior. Moreover, three issues appear to be clear. First, even if there is some merit in the megabanks' self-promoting arguments against the existence of the subsidies, the studies of interest-free experts should be sorted out from research undertaken by sophisticated lobbyists or those who work for big banks, and the professional opinions of those in the second category should not be viewed equally.¹⁶³ Second, whether one believes that TBTF banks do receive massive subsidies or not, it is difficult to argue that providing such subsidies would prove to be objectively efficient and economically beneficial in the longer term. Based on empirical studies of past subsidies by Harvard University's Professor Barro's, this seems to be very unlikely. Professor Barro showed that many multipliers from countless spending projects are well below 1.0, and the aggregate effect on GDP is effectively negative.¹⁶⁴ Consequently, he stated that policy makers must be very cautious when deciding about government subsidies using arguments based on Keynesian multipliers. Building up on this theory, certain commentators have argued that bank subsidies, should be put to a very heavy burden of justification, to ensure that they would not jeopardize the country's economic health.¹⁶⁵ Finally, while it is incredibly difficult to document and quantify the different potential elements of support to the biggest banks, also due to transparency problems, even partial estimates point at the banking

¹⁶² See Yi-Kai Chen, Eric J. Higgins & Joseph. R. Mason, *Economies of Scale in the Banking Industry: The Effects of Loan Specialization* (Drexel University Working Paper, 2004), available at <http://www.ibrarian.net/navon/page.jsp?paperid=1174167&searchTerm=bank+profit>; Davies & Tracey, *supra* note 158 (finding scale economies at big banks may be driven by TBTF advantages); Mark Roe, *Structural Corporate Degradation Due to Too-Big-To-Fail Finance*, 162 U. PA. L. REV. 1419, 1419 (arguing that a major retardant to industrial firm overexpansion has gone missing for large financial firms when "(1) the funding boost that a firm captures by being too-big-to-fail sufficiently lowers the firm's financing costs, and (2) a resized firm or the spun-off entities would lose that funding benefit . . ."). Professor Roe compares this effect to a corporate poison pill. *Id.*

¹⁶³ *Examining the GAO Study on Government Support for Bank Holding Companies: Hearing Before the S. Comm. on Banking, Housing, and Urban Affairs*, 113th Cong. 117 (2014), (testimony of Simon Johnson, Professor, MIT Sloan School of Mgmt.), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113shrg89479/pdf/CHRG-113shrg89479.pdf>.

¹⁶⁴ See Barro, *supra* note 61.

¹⁶⁵ Dale A. Oesterle, *State and Local Government Subsidies for Businesses: A Siren's Trap*, 6 OHIO ST. ENTREPRENEURIAL BUS. L.J. 491, 502 (2011).

sector receiving extremely large subsidies.

III. THE TBTF SUBSIDIES' PERVERSE EFFECTS

A. TBTF Banks' Competitive Advantage over Other Banks

While the regulation of national banks and their subsidiaries' activities is within Congress' authority,¹⁶⁶ subsidizing megabanks and discriminating in favor of them using taxpayers' funds,¹⁶⁷ hurts the economy and commerce.¹⁶⁸ The competitive advantages the megabanks receive are mainly based on the government's "guarantee" to their assets that are already protected by the FDIC—bank deposits, as well as access by the non-depository elements of the big banks to Federal Reserve loans.¹⁶⁹ Partly due to their disadvantage, the smaller banks have not been able to fairly compete fairly with bigger banks,¹⁷⁰ and following the 2008 financial crisis, many smaller banks have failed.¹⁷¹ And while it is not fair to say that the big banks caused such failures, the less favorable financial terms that smaller banks receive and the market perception of them as riskier, certainly contributed to these failures.

Moreover, such failures negatively impact the U.S. economy and specifically interstate commerce. For example, community banks, which constitute approximately 98% of all U.S. banks,¹⁷² form a critical element of the banking industry. Although they jointly hold only 14.2% of all banking

¹⁶⁶ Visitorial Powers Final Rule, 23 NO. 1 OCC Q.J. 64, 2004 WL 2360332 (2004).

¹⁶⁷ Paul Bucheit, *The Average American Family Pays \$6,000 a Year in Subsidies to Big Business*, ALTERNET (Sept. 22, 2013), <http://www.alternet.org/economy/average-american-family-pays-6000-year-subsidies-big-business>. "Similarly, based on a conservative estimate the crisis cost \$50,000 to \$120,000 for every U.S. household." Rob Garver, *Breaking Up the Big Banks: Here's How to Do It*, FISCAL TIMES (Jan. 13, 2014), <http://www.thefiscaltimes.com/Articles/2014/01/13/Three-Big-Ideas-Breaking-Big-Banks>.

¹⁶⁸ Discriminating against smaller, union, or community banks by giving them less tax benefits and exemptions than to TBTF banks can be viewed as discriminatory taxation of out-of-state commerce that runs afoul of the Commerce Clause.

¹⁶⁹ See Tyler Atkinson, David Luttrell and & Harvey Rosenblum, *How Bad Was It? The Costs and Consequences of the 2007–09 Financial Crisis*, FED. RES. BANK OF DALLAS, STAFF PAPERS (Jul. 20, 2013), available at <http://dallasfed.org/assets/documents/research/staff/staff1301.pdf>; Garver, *supra* note 167.

¹⁷⁰ Tanya D. Marsh, *Community Banks Are Failing; Pawnshops Are Growing*, HUFFINGTON POST (Aug. 25, 2013, 2:07 PM), http://www.huffingtonpost.com/tanya-d-marsh/community-banks-are-faili_b_3813223.html ("Even before the Financial Crisis, smaller banks saddled with a growing regulatory burden found it difficult to compete with more efficient mega banks.").

¹⁷¹ This includes commercial and investment banks, and savings and loan associations that were (i) were taken over or merged with another entity, (ii) were declared insolvent or liquidated, or (iii) had filed for bankruptcy. A list of banks that were have been liquidated by the FDIC since Oct. 1, 2000 is available at <http://www.fdic.gov/bank/individual/failed/banklist.html>.

¹⁷² Tanya D. Marsh, *Too Big to Fail Versus Too Small to Notice: Addressing the Commercial Real Estate Debt Crisis*, 63 ALA. L. REV. 321, 371 (2012).

institutions' assets, community banks have played a significant role for individual consumers.¹⁷³ Community banks offer approximately half of small-business loans and farm loans, more than one-third of commercial real estate loans, and one-sixth of residential mortgage loans. Moreover, community banks are exceptionally significant in rural America, where no other financial service providers are accessible to more than one-third of American districts.¹⁷⁴ Nevertheless, the government is not too concerned by community banks' failures,¹⁷⁵ although it should be. Similarly, recent banking regulation that has been imposed on big and small banks—mostly in order to address shortfalls in large banks' functioning—does not help increase smaller banks' business activity.¹⁷⁶

Small banks do tend to rely on deposit insurance for funding, and advances from the Federal Home Loan Banks for mortgage lending much more than big banks, as those provide the smaller banks a fairly cheap source of capital, but deposit insurance does not significantly subsidize small banks.¹⁷⁷ Therefore, while it is true that larger banks rely more heavily on bonds and other capital-market sources, there is moral hazard involved with banks of all sizes, because deposits are covered by the FDIC, and that means most depositors know that they will not take losses if banks, big or small, fail.¹⁷⁸ Additionally, deposits insurance is an explicit benefit that is fully paid for, especially by the smaller banks, unlike the after-the-fact and unpaid implicit subsidies that the biggest banks enjoy, as well as their investors who do not suffer losses from their banks' bad lending decisions only because of government interventions.¹⁷⁹

¹⁷³ Tanya D. Marsh, *Preserving Community Banks Should Be Bi-Partisan Priority*, HUFFINGTON POST (Jul. 16, 2013, 2:41PM), http://www.huffingtonpost.com/tanya-d-marsh/preserving-community-bank_b_3602087.html.

¹⁷⁴ *Id.*

¹⁷⁵ See generally Marsh, *supra* note 172. "In the current economic crisis, much attention has been paid to the financial institutions deemed 'too big to fail.' At the other end of the spectrum are the small banks that policymakers view as 'not systemically important' and whose failure, therefore, is too minor to attract notice. In the aggregate, however, those small banks are incredibly important." *Id.* at 379.

¹⁷⁶ Joe Adler, *Regulatory Relief Bills Gain Momentum in Congress*, AM. BANKER (Jul. 30, 2013, 4:03PM), http://www.americanbanker.com/issues/178_146/regulatory-relief-bills-gain-momentum-in-congress-1060984-1.html (discussing community banks' protests about the burden and reach of new expansive regulation on them).

¹⁷⁷ See Swagel, *supra* note 37.

¹⁷⁸ *Id.*

¹⁷⁹ *Id.* (Given this unfair advantage, a new regulatory change is meant to have the biggest banks pay insurance premiums to the FDIC on their nondeposit sources of funds too, even though these borrowings are not covered by the federal guarantee and would take losses under Dodd-Frank Title II. The idea is that deposits tend to be more stable than bonds and other capital market borrowings, so charging big banks for using less stable sources of funds provides an incentive against financial system volatility); *Frequently Asked Questions: Lower Deposit-Insurance Assessment Rates for Community Banks*, Independent Community Bankers of America, <http://www.icba.org/files/ICBASites/PDFs/HR2897FAQ.pdf>. Additionally, "[b]ig banks, not small banks, are the major players in the market for short-term debt, which makes their bonds riskier than small banks' bonds. So, if the market prices the big and small

B. The Separation of Powers Issue

It has long been determined that all “banking legislation, and federal regulation of finance in general, rest upon powers of Congress . . . to make all laws necessary and proper for carrying into execution the foregoing powers. . . .”¹⁸⁰ Using this power, Congress and the Office of the Comptroller of the Currency (OCC) have authorized national banks to do “as shall be deemed necessary to carry on the business of banking.”¹⁸¹ Notwithstanding the above, commentators have argued that Congress was not meant to have such broad powers to give subsidies such as the TBTF subsidies.¹⁸² Following up on these arguments, regulators took steps to limit the impact of the arguable TBTF subsidies.¹⁸³ However, many still argue that the measures that were taken are not enough and that granting the TBTF subsidies perversely impacts the separation of powers principle.¹⁸⁴ While there are no explicit law or procedures about the government’s ability to give subsidies, it has become the norm that the government can and often does do so, despite historic debates about its power.¹⁸⁵ As Treasury Secretary, Hamilton strongly supported federal aid, believing it would provide a strong economic basis, and believing that anything not explicitly prohibited by the Constitution was a legal and proper power of the federal government.¹⁸⁶ Jefferson had a different perspective, believing that the federal

banks’ long-term debt similarly, even though the big banks’ debt is riskier, something must be giving the big banks’ riskier debt a boost.” Mark Roe, *The Costs of “Too Big To Fail,”* Harvard Law School Forum on Corporate Governance and Financial Regulation (June 26, 2013 at 5:43PM), <http://blogs.law.harvard.edu/corpgov/2013/06/26/the-costs-of-too-big-to-fail/>.

¹⁸⁰ See, e.g., *Norman v. B. & O. R.R.*, 294 U.S. 240, 303 (1935); *Juilliard v. Greenman*, 110 U.S. 421, 439–440 (1884).

¹⁸¹ See 12 U.S.C. §§ 24, 85 (2014).

¹⁸² See, e.g., *Davis v. Monroe Cnty. Bd. of Educ.*, 526 U.S. 629, 654–55 (1999) (Kennedy, J., dissenting) (discussing the need for federalism-based limits on spending); Lynn A. Baker, *Conditional Federal Spending After Lopez*, 95 COLUM. L. REV. 1911, 1945–57 (1995) (calling for stronger federalism-based limits on the spending power); Lynn A. Baker, *The Revival of States’ Rights: A Progress Report and a Proposal*, 22 HARV. J.L. & PUB. POL’Y 95, 102–03 (1998) (advocating for strengthening Dole’s conditional spending analysis); Glenn Cohen & James F. Blumstein, *The Constitutionality of the ACA’s Medicaid-Expansion Mandate*, 366 NEW ENG. J. MED. 103 (2012) (advocating for the Court to adopt a stronger coercion approach).

¹⁸³ See e.g., 12 U.S.C.A. § 1851 (b)(1) (2014) (stating that “the Financial Stability Oversight Council shall study and make recommendations on implementing the provisions of this section so as to” (C) “limit the inappropriate transfer of Federal subsidies from institutions that benefit from deposit insurance and liquidity facilities of the Federal Government to unregulated entities”).

¹⁸⁴ See Debra Cassens Weiss, *Constitutionality of Bailout Law is Questioned*, A.B.A. J., (Jan. 16, 2009, 2:10 PM), available at http://www.abajournal.com/mobile/article/constitutionality_of_bailout_law_is_questioned.

¹⁸⁵ John C. Eastman, *Restoring “General” to the General Welfare Clause*, 4 CHAPL. REV. 63 (2001) (examining the understanding of the Spending Clause, and the competing interpretations of it offered by Madison, Jefferson, and Hamilton, who viewed the clause as a stand-alone grant of power).

¹⁸⁶ In his famous 1791 Report, Hamilton proposed federal subsidies to promote manufacturing, and

government should not exercise any power not explicitly granted to it by the Constitution.¹⁸⁷ Today, despite debates over the scope and legitimacy of some subsidies, most industries receive government aid, directly or indirectly. Moreover, Hamilton's view has been adopted, and Congress uses "the spending power and the conditional grant of federal funds" to achieve goals that are not included in the other enumerated powers.¹⁸⁸

However, while Congress has extremely broad subsidy-giving powers, taxpayers have an extremely limited ability to challenge federal spending in courts, due to restrictive standing rules.¹⁸⁹ Such standing rules are not sound as they virtually insulate federal spending from review.¹⁹⁰ Fortunately, however, these rules can be changed. Standing is described as "one of 'the most amorphous [concepts] in the entire domain of public law,'"¹⁹¹ and the doctrine of standing is "continuously evolving,"¹⁹² especially, in the context of taxpayer standing. In the last several decades, a number of key Supreme Court decisions dealt with federal taxpayer suits. But while the

made clear that he thought Congress was authorized grant subsidies. See ALEXANDER HAMILTON, REPORT ON MANUFACTURES, 1 ANNALS OF CONGRESS 971, 1033 (Dec. 5, 1791), available at http://www.constitution.org/ah/rpt_manufactures.pdf.

¹⁸⁷ A generation later, with highly debated transportation subsidies, the controversy over the constitutionality of subsidies was still relevant. Ultimately, the Civil War concluded the controversy, and the rise of the Republican Party confirmed that subsidies would continue. Following the Civil War, Republicans assertively encouraged subsidies for manufacturers in various industries, and under the Newlands Reclamation Act, the government spent billions on reclamation projects. See generally Howard Gillman, *How Political Parties Can Use the Courts to Further Their Agendas: Federal Courts in the United States, 1875–1891*, 96 AM. POL. SCI. REV. 511, 513 (2002) (arguing that the Republican Party expanded federal jurisdiction to have courts promote its economic agenda).

¹⁸⁸ See *South Dakota v. Dole*, 483 U.S. 203, 206–07 (1987) ("[T]he power of Congress to authorize expenditure of public moneys for public purposes is not limited by the direct grants of legislative power found in the Constitution." Thus, objectives not thought to be within Article I's 'enumerated legislative fields' may nevertheless be attained through the use of the spending power and the conditional grant of federal funds.") (internal citations omitted).

¹⁸⁹ See, e.g., *Massachusetts v. Mellon*, 262 U.S. 447, 486–88 (1923) decided with *Frothingham v. Mellon*, 262 U.S. 447, 486–88 (1923) (dismissing a suit brought by a taxpayer that challenged the federal Maternity Act, arguing that the Act would lead to an increase of her future taxes. The Court ruled that the causal link between federal spending and taxpayers' injury is uncertain, and that a taxpayer would need to show that he "sustained or is immediately in danger of sustaining some direct injury . . . and not merely that he suffers in some indefinite way in common with people generally"); *Duke Power Co. v. Greenwood County*, 302 U.S. 485, 490 (1938); *Alabama Power Co. v. Ickes*, 302 U.S. 464, 478–79 (1938).

¹⁹⁰ Cf. Ryan C. Squire, Note, *Effectuating Principles of Federalism: Reevaluating the Federal Spending Power as the Great Tenth Amendment Loophole*, 25 PEPP. L. REV. 872, 872 (1998).

¹⁹¹ *Flast v. Cohen*, 392 U.S. 83, 99 (1968) (quoting Hearing on S. 2097 before the Subcomm. on Constitutional Rights of the Senate Judiciary Committee, 89th Cong. 467–68 (1966) (statement of Prof. Paul A. Freund) (alteration in *Flast*)).

¹⁹² For commentary suggesting that standing doctrine is a creature of evolution, see Eric J. Kuhn, *Standing: Stood Up at the Courthouse Door*, 63 GEO. WASH. L. REV. 886, 887 (1996); Cass R. Sunstein, *What's Standing after Lujan? Of Citizen Suits, "Injuries," and Article III*, 91 MICH. L. REV. 163, 168–97 (1992).

Supreme Court in *Flast*¹⁹³ expanded taxpayers' standing, the recent *Cuno*¹⁹⁴ and *Winn*¹⁹⁵ decisions made it clear that the Court is retreating from broader standing options.¹⁹⁶ And in the recent *Hein* case the Court seemed to indicate that its past exception could apply only to funding made in accordance with specific legislative action.¹⁹⁷ Thus, taxpayers will not be able to challenge subsidies such as the TBTF ones as they are not articulated in a specific legislation.

But more importantly, the recent *Hein* decision is problematic because it makes the executive branch's unchecked spending hazardous.¹⁹⁸ Allowing the executive branch to spend money without any review risks constitutional violations, because not giving the courts the power to hear cases questioning the executive branch's activity can conflict with the balance of power.¹⁹⁹ Similarly, referring specifically to the bailouts and TBTF subsidies, certain commentators have argued that "Congress has no constitutional authority to delegate nearly plenary legislative power to the Treasury secretary, an executive branch official," as it conflicts with the balance of powers principle,²⁰⁰ when one authority is receiving the other authority's power rather than help with checks and balances.

¹⁹³ *Flast supra* note 191, at 99 (creating a limited exception to a prohibition against federal taxpayer suits, the Court mentioned a two-part test that federal taxpayers must pass to have a sufficient "taxpayer's stake in the outcome" to justify standing. First, establishing "a logical link between status and the type of legislative enactment attacked," and Second, "the taxpayer must establish a nexus between that status and the precise nature of the constitutional infringement alleged."). Following *Flast*, however, there was a retreat from the broader application in the Court's decisions. See generally Edward A. Zelinsky, *Putting State Courts In The Constitutional Driver's Seat: State Taxpayer Standing After Cuno and Winn*, 40 HASTINGS CONST. L. Q. 1 (2012).

¹⁹⁴ *Daimler Chrysler Corp. v. Cuno*, 547 U.S. 332, 332 (2006). In *Daimler*, municipal and state taxpayers challenged the constitutionality of two Ohio tax provisions. *Id.* The Court dismissed the challenge, as "state taxpayers have no standing under Article III to challenge state tax or spending decisions simply by virtue of their status as taxpayers." *Id.*

¹⁹⁵ *Ariz. Christian Sch. Tuition Org. v. Winn*, 658 F.3d 890 (9th Cir. 2011), *aff'd*, 131 S.Ct. 1436, at 1440 (2011).

¹⁹⁶ Edward A. Zelinsky, *supra* note 193, at 35. *Putting State Courts In The Constitutional Driver's Seat: State Taxpayer Standing After Cuno And Winn*, 40 HASTINGS CONST. L. Q. 1, 35 (2012).

¹⁹⁷ *Hein v. Freedom From Religion Foundation*, 551 U.S. 587 (2007). At issue in *Hein*, was President Bush's creation of an Office that was meant to ensure that faith-based groups would be eligible to compete for federal assistance, as long as they did not use funding toward religious activities; since no congressional legislation authorized the Office or appropriated money for its activities, the Court dismissed the taxpayers' claims that the support violated the Establishment Clause as unlike in *Flast*, they had not established a sufficient nexus between their status and the power to tax and spend.

¹⁹⁸ Regina Kaley, Note, *Can Taxpayers Stand Discrimination?: Lack of Standing and the Religious Freedom Restoration Act Permits the Executive Branch to Fund Discrimination Within Religious Organizations*, 49 J. CATH. LEGAL STUD. 195, 206–207 (2010).

¹⁹⁹ *Id.*

²⁰⁰ See Weiss, *supra* note 184.

C. Honesty is the Best Policy? No Transparency

It is a long-settled doctrine that “[t]he question of the constitutionality of action taken by Congress does not depend on recitals of the power which it undertakes to exercise.”²⁰¹ But if the federal government can and does grant TBTF banks massive subsidies, Congress should be encouraged to transparently disclose the basis on which it grants such massive subsidies. Especially, as large parts of non-cash political interventions with TBTF banks are difficult to quantify, the data necessary to do so is deficient, and many government programs across different agencies have some involvement with the financial sector, which measuring the subsidies even more complicated.

Given the TBTF subsidies’ estimated volume, their non-transparent nature, and the fragmented data available on them, providing them results in two transparency-related perverse effects. First, and most importantly, it creates a norm, which conflicts with democratic governance procedures. It conflicts with establishing an independent and transparent constitutional review mechanism that exists in other countries.²⁰² Although “it has long been a value in liberal constitutional regimes that regulation be transparent,”²⁰³ and despite the fact that some of the American founding fathers discussed the need for the legislative branch to be open to the public, while trying to advance certain political interests²⁰⁴ the Constitution imposes no structural, uniform openness requirement upon Congress. Rather, it creates specific and limited disclosure practices,²⁰⁵ and dictates that only Congress can impose procedural rules upon itself.²⁰⁶ And while Congress has not created such rules, it cannot ignore its responsibility to show for each subsidy policy the relevant circumstances on which it based the decision to provide federal support.²⁰⁷ And, if the circumstances based on which Congress decided to provide support change, then a “continuous and vigilant

²⁰¹ *Woods v. Cloyd W. Miller Co.*, 333 U.S. 138, 144 (1948).

²⁰² “[T]he United States government and administration is less transparent than other nations: A law like the 2001 EC Regulation that offers the citizens of the Union access to virtually all correspondence and other documents kept and sent by one of the three organs of the EU surpasses any FOIA attempt to transparency by far.” Marci A. Hamilton & Clemens G. Kohnen, *The Jurisprudence of Information Flow: How the Constitution Constructs the Pathways of Information*, 25 *Cardozo L. Rev.* 267, 289–93 (2003).

²⁰³ Lawrence Lessig, *The Law of the Horse: What Cyberlaw Might Teach*, 113 *HARV. L.REV.* 501, 533 (1999).

²⁰⁴ See Adrian Vermeule, *The Constitutional Law of Congressional Procedure*, 71 *U. CHI. L. REV.* 361, 415 (2004).

²⁰⁵ Mark Fenster, *Seeing the State: Transparency as Metaphor*, 62 *ADMIN. L. REV.* 617, 638 (2010).

²⁰⁶ *Id.* at 76; Rebecca M. Kysar, *Listening to Congress: Earmark Rules and Statutory Interpretation*, 94 *CORNELL L. REV.* 519, 529–33 (2009).

²⁰⁷ STAFF OF JOINT ECONOMIC COMM., 89TH CONG., REP. ON SUBSIDY AND SUBSIDY-EFFECT PROGRAMS OF THE U.S. GOVERNMENT I (Comm. Print 1965).

reexamination” of the subsidy, and the justification to continue it is due.²⁰⁸ According to Congressional Committee findings, federal programs that are meant to support the economic position of particular groups should be frequently reexamined considering the changing circumstances. “Regardless to their original justification, subsidy plans should be so contrived as to eradicate the necessity for their continuation. The broad changes which must be expected in our economy require continuing revision in the scope and character of these plans if they are to accomplish their purposes.”²⁰⁹

Second, it seems fair to argue that the lack of information or transparency concerning the TBTF subsidies hurts predictability in and stability of the financial markets, as major banks and investors are not sure what to realistically expect.²¹⁰

D. Too Big To Jail

Following the financial crisis, it has become known that one of the perverse effects of the TBTF problem is the government’s “deferred prosecution” policy for big banks that violate criminal laws.²¹¹ This policy, which is legal,²¹² was nicknamed too-big-to-jail, and causes more and more anger,²¹³ as reports about the biggest banks’ wrongdoings keep getting released.²¹⁴ Trying to justify this policy, Attorney General Holder explained that the DOJ could not indict big banks because that might harm the economy.²¹⁵ Further demonstrating this policy, in 2013 JPMorgan reached a

²⁰⁸ *Id.*

²⁰⁹ *Id.*

²¹⁰ See generally Kensil E. Sean & Margraf Kaitlin, *The Advantage of Failing First: Bear Stearns v. Lehman Brothers*, 22 J. OF APPLIED FINANCE 2 (2012) (discussing why Lehman was forced into bankruptcy, while Bear Stearns was bailed out).

²¹¹ See generally Nizan Geslevich Packin, *Breaking Bad: Big Banks Not Guilty As Not Charged*, 91 WASH. U. L. REV. 1089 (2014); Arthur E. Wilmarth Jr., *Turning a Blind Eye: Why Washington Keeps Giving in to Wall Street*, 81 U. CIN. L. REV., 1283, 1428 (2013); Jessica Silver-Greenberg, *HSBC to Pay Record Fine to Settle Money-Laundering Charges*, N.Y. TIMES, Dec. 11, 2012, at B3, available at http://dealbook.nytimes.com/2012/12/11/hsbc-to-pay-record-fine-to-settle-money-laundering-charges/?_r=0.

²¹² “[F]ederal prosecutors in the United States possess broad discretion to pursue criminal charges, or not, against organizations. . . [their] guidelines lay out a set of factors that them-selves permit broad discretion.” See Brandon L. Garrett, *Globalized Corporate Prosecutions*, 97 VA. L. REV. 1775, 1789 (2011).

²¹³ Press Release, Oregon Senator Jeff Merkley, *Merkley Blasts “Too Big to Jail” Policy for Law-breaking Banks*, JEFF MERKLEY UNITED STATE SENATOR FOR OREGON (Dec. 13, 2012) available at <http://www.merkley.senate.gov/newsroom/press/release/?id=42a606e4-7c45-42ed-8348-c77c508f9281> (Senator Merkley blasted the DOJ for its policy and demanded explanations).

²¹⁴ See, e.g., Ben Protess & Jessica Silver-Greenberg, *JPMorgan Is Penalized \$2 Billion Over Madoff*, N.Y. TIMES (Jan. 7, 2014), <http://dealbook.nytimes.com/2014/01/07/jpmorgan-settles-with-federal-authorities-in-madoff-case/>; *Is EVERY Market Rigged?*, WASHINGTONSBLOG, (May 19, 2013), <http://www.washingtonsblog.com/2013/05/is-every-market-rigged.html>.

²¹⁵ Eric Holder, testifying before a Senate committee said that he is “concerned that the size of some

\$13-billion settlement with the government for the bank's role in creating the 2008 mess.²¹⁶ And even though the government declared that this does not release JPMorgan from potential prosecution,²¹⁷ megabanks typically receive deferred or nonprosecution agreements, and based on such settlements avoid indictment or convictions.²¹⁸

Letting JPMorgan and other banks escape criminal liability, much like not prosecuting the individuals who managed those banks,²¹⁹ discriminates against smaller banks and disregards principles of equality under the law.²²⁰ Many commentators argue that the biggest banks' executives and managers behaved unethically and helped fuel the financial crisis, yet such individuals typically do not get prosecuted.²²¹ Accordingly, it is fair to argue that the too-big-to-jail policy encourages criminal behavior as it incentivizes banks to continue behaving unethically. Certainly, a simple cost-benefit analysis shows that even if a fine is greater than a criminally obtained profit, which is usually not the case, such a fine can be paid by committing more crimes in the future,²²² for which the banks and their executives will probably not face criminal liability.²²³

of these institutions becomes so large that it does become difficult for us to prosecute them when we are hit with indications that if you do prosecute, if you do bring a criminal charge, it will have a negative impact on the national economy, perhaps even the world economy." See Peter Schroeder, *Holder: Big Banks' Size Complicates Prosecution Efforts*, THE HILL, (Mar. 6, 2013), available at <http://thehill.com/blogs/on-the-money/banking-financial-institutions/286583-holder-big-banks-size-complicates-prosecution-efforts#ixzz2fxmQO2Uk>.

²¹⁶ See Peter Eavis & Ben Protes, *Considering the Fairness of JPMorgan's Deal*, N.Y. TIMES, Oct. 22, 2013, at B1, available at <http://dealbook.nytimes.com/2013/10/21/considering-the-fairness-of-jpmorgans-deal/>.

²¹⁷ Danielle Kurtzleben, *Potential Criminal Charges Loom, but JPMorgan May Remain Too Big to Jail*, US NEWS (Nov. 19, 2013, 5:41 PM), available at <http://www.usnews.com/news/articles/2013/11/19/potential-criminal-charges-loom-but-jpmorgan-may-remain-too-big-to-jail>.

²¹⁸ *Id.*

²¹⁹ "[N]ot a single high level executive has been successfully prosecuted in connection with the recent financial crisis, and given the fact that most of the relevant criminal provisions are governed by a five-year statute of limitations, it appears very likely that none will be." Jed S. Rakoff, *Why Have No High Level Executives Been Prosecuted In Connection With The Financial Crisis?*, N.Y. REV. BOOKS (Jan. 9, 2014), available at <http://www.nybooks.com/articles/archives/2014/jan/09/financial-crisis-why-no-executive-prosecutions/>. Judge Rakoff is a Southern District of New York Federal Judge.

²²⁰ *Id.*

²²¹ "[T]he prevailing view. . . the crisis was in material respects the product of intentional fraud. . . [accordingly] the widespread conclusion that fraud at every level permeated the bubble in mortgage-backed securities." *Id.*

²²² John Titus, *How Obama Surrendered Sovereignty To The Criminal Banking Cartel*, THE DAILY BAIL, (Apr. 24, 2013, 5:33PM), <http://dailybail.com/home/how-obama-surrendered-sovereignty-to-the-criminal-banking-ca.html>.

²²³ "Clearly, the government has bought into the notion that too big to fail is too big to jail. When prosecutors choose not to prosecute to the full extent of the law in a case as egregious as this, the law itself is diminished." See Editorial, *Too Big to Indict*, N.Y. TIMES, Dec. 11, 2012, at A38, available at <http://www.nytimes.com/2012/12/12/opinion/hsbc-too-big-to-indict.html>

E. Negative Behavioral Incentives

“Show me the money!”²²⁴

Governments use subsidies as a tool to intervene in how businesses are conducted in certain industries, and to increase or decrease productivity in order to advance social or economic interests. But subsidies often do much more than originally intended, creating or eliminating undesired incentives,²²⁵ which result in unintended consequences.²²⁶ One example of such unintended consequence in the energy industry, to which the government gave \$96.3 billion via sixty different subsidies between 2005–2009, is the increasing of carbon dioxide (CO₂) emissions.²²⁷ Focusing on energy, the government tried to increase production, subsidize consumption, and increase energy efficiency.²²⁸ However, while these goals were not related to CO₂ emissions, they nonetheless affected the CO₂ emissions in the U.S. through their impact on the energy markets. Accordingly, between 2005–2008, energy-related subsidies had the net effect of increasing CO₂ emissions by an average of 47.3 million metric tons per year. Nevertheless, by 2009, government spending shifted toward subsidies that had the exact opposite effect, and lowered CO₂ emissions, creating a net effect of reducing CO₂ emissions by 37.9 million metric tons.²²⁹

The agriculture industry is another example of a subsidies-receiving

²²⁴ Jerry Maguire (Gracie Films, 1996).

²²⁵ The problems in giving subsidies to businesses include: (i) making businesses become spendthrift, as government intervention almost never helps push down costs; (ii) “investing in technology that is not economically viable,” because subsidies are typically not driven by market demands; (iii) distorting business decisions, and inducing companies to put more production than is efficient; (iv) venture capitalists fund the best projects, and thus if venture capitalists “reject a project, it is difficult to believe that the government could do a better job of picking a winner.” See *Removing the Barriers to Free Enterprise and Economic Growth: Hearing Before the H. Comm. on the budget*, 112nd Cong. 19–20 (2012). See *The Obama Administration’s Green Energy Gamble: Hearing Before House Comm. on Oversight & Gov’t Reform, Subcomm. on Reg. Aff., Stimulus Oversight, and Gov’t Spending*, 112th Cong. 7 (2012) (statement of James Nelson, CEO, Solar3D), available at <http://www.gpo.gov/fdsys/pkg/CHRG-112hhrg74453/pdf/CHRG-112hhrg74453.pdf>.

²²⁶ See Edwards et al., *supra* note 39.

²²⁷ Pursuant to the EPA, “Carbon dioxide (CO₂) is the primary greenhouse gas emitted through human activities. In 2011, CO₂ accounted for about 84% of all U.S. greenhouse gas emissions from human activities. Carbon dioxide is naturally present in the atmosphere as part of the Earth’s carbon cycle . . . Human activities are altering the carbon cycle—both by adding more CO₂ to the atmosphere and by influencing the ability of natural sinks, like forests, to remove CO₂ from the atmosphere.” See Carbon Dioxide Emissions, EPA.GOV, available at <http://www.epa.gov/climatechange/ghgemissions/gases/co2.html> (last visited March 9, 2015).

²²⁸ See MAURA ALLAIRE & STEPHEN P. A. BROWN, PEW CHARITABLE TRUSTS, U.S. ENERGY SUBSIDIES: EFFECTS ON ENERGY MARKETS AND CARBON DIOXIDE EMISSIONS 1 (Aug. 2012), available at http://www.pewtrusts.org/~media/legacy/uploadedfiles/wwwpewtrustsorg/reports/fiscal_and_budget_policy/EnergySubsidiesFINAL.pdf.

²²⁹ *Id.*

industry, in which the subsidies resulted in many unintended consequences. Dating back to Roosevelt's New Deal Farm Program, which kept prices high in case of overproduction by paying farmers and then getting rid of their product, the government tried to control what it believed should be the right amount of production.²³⁰ Then, during Nixon's presidency, the goal of subsidies was reversed, and the government encouraged production, by guaranteeing farmers an agreed minimum price for their harvests.²³¹ Today, farmers get paid based not on their harvests, but on their size and production history.²³² However, some farmers receive more funds than others. Bigger farms get more funds than smaller farms, and four food crops—corn, soy, wheat, and rice—receive approximately 60% of subsidy payments. Directly related to their subsidies, these four food crops comprise approximately 66% of the calories consumed by Americans.²³³ Thus, government subsidies to farmers creating cheap corn, soy, wheat, and rice have direct and perhaps undesired impacts on the public's health and nutrition²³⁴.

Finally, a third example of subsidies' unintended consequences is found in the fishing industry. Research shows that subsidies in the fishing industry led to overfishing. This is the result of increasing fishing efforts artificially and turning fishing into a more profitable industry than it really is,²³⁵ especially as the subsidies are worth one-fifth of the value of the catch itself.²³⁶

In the context of the banking sector, it appears that government subsidies reinforce undesired incentives amongst banks' executives resulting in unwanted consequences.²³⁷ Specifically, TBTF subsidies distort economic incentives and encourage banks to (i) excessively borrow,²³⁸ (ii) take excessive risks,²³⁹ and (iii) expand into various unrelated industries.²⁴⁰

The incentive to excessively borrow is a direct result of the subsidies banks receive. Since the government support protects them, their deposi-

²³⁰ See *Yale Sustainable Food Project*, available at http://www.yale.edu/sustainablefood/S9256YSF_farm_bill_s.pdf (last visited Sept. 9, 2015).

²³¹ *Id.*

²³² *Id.*

²³³ *Id.*

²³⁴ *Id.*

²³⁵ See generally Sharp, R. and U.R. Sumaila, *Quantification of U.S. Marine Fisheries Subsidies*, *North American Journal of Fisheries Management* (Feb. 2009), available at http://www.lenfestocean.org/~media/legacy/Lenfest/PDFs/subsidies_rsr_final.pdf?la=en.

²³⁶ *Id.*

²³⁷ See Wilmarth, *supra* note 27, at 707 (arguing that any regulatory reform's main goals should be to eliminate TBTF subsidies and to mandate that SIFIs internalize the risks and costs of their activities.).

²³⁸ See ANAT ADMATI & MARTIN HELLWIG, *BANKERS' NEW CLOTHES*, 129–30 (2013).

²³⁹ See Wilmarth, *supra* note 27, at 707.

²⁴⁰ The Editors, *What Are Banks Doing in Energy and Aluminum Anyway?*, BLOOMBERG VIEW, (Jul. 30, 2013, 8:00 AM) available at <http://www.bloomberg.com/news/2013-07-30/why-are-banks-selling-aluminum-anyway-.html>.

tors and even their creditors and shareholders, all these constituents rely on government's protection, which, as discussed above, enables big banks to get loans with more favorable terms.²⁴¹ These improved terms give big banks incentives to prefer borrowing to other forms of funding for their investments.²⁴² The preferential tax treatment of debt also contributes to this preference,²⁴³ because the more banks borrow, the bigger the subsidies they receive are.²⁴⁴ This incentive to have as little equity as possible and to over-borrow exposes the economy to financial risks.²⁴⁵

Similar to the incentive to over-borrow, the incentive to take excessive risks, which already exists for various reasons,²⁴⁶ is also enhanced by the government's grant of subsidies²⁴⁷ because they function like a guarantee. Indeed, it is typically the case that business subsidies encourage investing in very uncertain projects, as was also the case with Enron's international investments, which contributed to Enron's collapse. Enron received \$3.7 billion government subsidies for its foreign schemes, and subsidies from global agencies such as the World Bank,²⁴⁸ and those subsidies made possible Enron's excessively risky foreign investments, which crashed around the time that Enron's frauds were being discovered.²⁴⁹ Similar to Enron's management, large banks' executives expect to share in any profits that flow to the banks, but feel protected from losses that the realization of risks might inflict on the banks. The main difference, however, is that losses inflicted on banks are in reality losses inflicted on banks' depositors, bondholders, preferred shareholders, and, as demonstrated in the 2008 crisis, taxpay-

²⁴¹ See ADMATI et al., *supra* note 238, at 129–30.

²⁴² *Id.*

²⁴³ *Id.*

²⁴⁴ *Id.*

²⁴⁵ *Id.*

²⁴⁶ See generally Lucian A. Bebchuk & Holger Spamann, *Regulating Bankers' Pay*, 98 GEO. L.J. 247 (2010).

²⁴⁷ Surprisingly, there has been little discussion or agreement on what kind of risk-taking is actually excessive, or even how to define excessive risk. See Wulf A. Kaal & Richard W. Painter, *Initial Reflections on an Evolving Standard: Constraints on Risk Taking by Directors and Officers in Germany and the United States*, 40 SETON HALL L. REV. 1433, 1438, 1440, 1449–50 (2010) (“[T]he concept[] of . . . ‘excessive risk’ [is] controversial. Whether . . . there is any such thing as excessive risk, and if so, how excessive risk is to be defined, is another issue. . . . The credit crisis of 2008-2009 also convinced many observers that the level of risk in the financial sector was excessive. . . . The more hotly debated question, however, is . . . [w]hich particular decisions by bankers were excessively risky, which were not, and how can one distinguish between the two? . . . Discerning excessive risk from other risk is highly subjective and an analysis likely to be undertaken differently in different cultural contexts The predominant unit of analysis for defining excessive risk—the individual risk bearer or society as a whole—can be different in different cultural contexts.”) (alteration in original) (citations omitted).

²⁴⁸ Jim Vallette & Daphne Wysham, *Enron's Pawns: How Public Institutions Bankrolled Enron's Globalization Game 4*, INSTITUTE FOR POLICY STUDIES (Mar. 22, 2002), available at <http://www.tni.org/sites/www.tni.org/archives/reports/seen/pawns.pdf>.

²⁴⁹ TIMOTHY P. CARNEY, *THE BIG RIPOFF 209* (John Wiley and Sons, Inc. 2006).

ers.²⁵⁰ And, as mentioned, subsidies augment the preexisting incentive to borrow more.²⁵¹ Incentivizing banks to take excessive risks works against the regulators' ineffective attempts to mandate that banks eschew excessive risks.²⁵² These ineffective attempts, which resulted in the 2008 crisis, fully shifted corporate focus to strategic risk-taking,²⁵³ and as a result, the Dodd-Frank Act focuses on risk-regulation.²⁵⁴

Finally, the grant of government subsidies to the biggest banks also incentivizes them to expand, at the taxpayers' expense, into unrelated industries like water utilities, electricity generation, natural gas distribution, and even the operation of municipal parking meters.²⁵⁵ However, since there is no valid economic reason for banks to be involved in such industries—and the banks' only advantage is offering cheaper funding due to the subsidies they receive—critics argued following several banking scandals in 2013 that banks should not meddle in unrelated industries.²⁵⁶

IV. NORMATIVE SOLUTIONS

Thus far, in attempting to deal with the TBTF problem, regulators have entertained several solutions with distinct but reasonably complementary purposes.²⁵⁷

A. Capital and Liquidity Levels

Receiving much attention, some argue that the best solution is requiring banks to increase their liquidity and capital levels, with the goal of making banks more resilient to financial market disruptions, while making cri-

²⁵⁰ See Bebchuk et al., *supra* note 246, at 266 (identifying key factors that provided bank executives with excessive incentives to take risks, and stating that even “bondholders’ expected costs from excessive risk-taking, and their incentives to limit such costs, are further reduced by the prospect that, in the event of bank failure, bondholders may benefit directly or indirectly from government funding even though they are not formally insured by the government. As financial institutions have grown larger over the last two decades, partly as a result of deregulation, it has become even more difficult for the government to commit to not bailing them out.”).

²⁵¹ See ADMATI et al., *supra* note 238, at 129.

²⁵² At least one court determined that while speculation is no longer imprudent per se, it is still undesired, which is why historical rules “broadly prohibited expansive categories of investments and techniques classified as ‘speculative.’” *Heidecker Farms, Inc. v. Heidecker*, No. 09-1541, 10-0273, 2010 WL 3894199, at *6 (Iowa Ct. App. Oct. 6, 2010).

²⁵³ Historically, business regulation has been passed in response to major breakdowns, which were related to excessive risk-taking in corporate America. See generally David A. Skeel, Jr., *Icarus and American Corporate Regulation*, 61 *BUS. LAW.* 155 (2005).

²⁵⁴ See generally Packin, *supra* note 10.

²⁵⁵ See ADMATI et al., *supra* note 238.

²⁵⁶ *Id.*

²⁵⁷ See Barth, *supra* note 44.

ses, bailouts, and the grant of subsidies' less likely.²⁵⁸ These commentators' calls for financial institutions to strengthen their liquidity positions and fund their activities with more shareholder equity became popular following the 2008 financial crisis. In the context of shareholder equity, there were calls for raising the standards using one of the two defined capital requirement approaches—(a) the leverage ratio approach and (b) the risk based approach. These led eventually to the 2010 Basel III reforms, which focus on leverage ratio requirements²⁵⁹ and new standards for liquidity regulation.²⁶⁰ Nevertheless, not all countries were eager to follow the new guidelines, and certain scholars, including Stanford professor Anat Admati, University of Bonn professor Martin Hellwig, and MIT professor Simon Johnson, who wrote extensively on these issues,²⁶¹ joined other commentators in research promoting stricter capital requirements.²⁶² Some higher capital requirements supporters found the Basel III leverage ratio to be too low for global SIFIs.²⁶³ Their advocating efforts resulted in several legislative and regulatory initiatives that have attempted to increase the minimum capital requirements for banks.

In summer 2013, Federal regulators unveiled a proposed Enhanced Supplementary Leverage Ratio rule,²⁶⁴ to increase the biggest banks' and

²⁵⁸ *Id.*

²⁵⁹ Mayra Rodríguez Valladares, *Why Basel's Latest Leverage Ratio Is Better*, AM. BANKER, (Jul. 16, 2013, 3:28 PM), available at <http://www.americanbanker.com/bankthink/why-basels-latest-leverage-ratio-is-better-1060635-1.html>. Each of the two capital requirement approaches has limitations. For example, leverage ratios create an incentive to take risks, while a risk based approach can often be gamed. *Id.*

²⁶⁰ See generally Basel Committee on Banking Supervision, *Basel III: A global regulatory framework for more resilient banks and banking systems*, BANK FOR INTERNATIONAL SETTLEMENTS (June 2011), available at <http://www.bis.org/publ/bcbs189.pdf>.

²⁶¹ See generally ADMATI et al., *supra* note 238; Simon Johnson, *The Impact of Higher Capital Requirements for Banks*, N.Y. TIMES (Apr. 18, 2013, 5:00 AM), <http://economix.blogs.nytimes.com/2013/04/18/the-impact-of-higher-capital-requirements-for-banks/>; Simon Johnson, *Low Bank Capital Is Next Fiscal Crisis*, BLOOMBERG VIEW (Jul. 31, 2011, 8:30 PM), <http://www.bloomberg.com/news/2011-08-01/low-bank-capital-is-the-next-u-s-fiscal-crisis-simon-johnson.html>.

²⁶² More recent studies that attempted to quantify the benefits and costs of capital requirements include P. Angelini, P. et al., *Basel III: Long-term Impact on Economic Performance and Fluctuations* (Bank for International Settlements Working Papers No. 338, Feb. 2011), available at <http://www.bis.org/publ/work338.pdf>; Basel Committee on Bank Supervision, *An Assessment of the Long-Term Economic Impact of Stronger Capital and Liquidity Requirements*, BANK FOR INTERNATIONAL SETTLEMENTS (Aug. 2010), available at <http://www.bis.org/publ/bcbs173.pdf>; Samuel G. Hanson, Anil K Kashyap & Jeremy C. Stein et al., *A Macro prudential Approach to Financial Regulation*, 25 J. OF ECON. PERSP. 3 (2011); and Anil Kashyap et al., *An Analysis of the Impact of 'Substantially Heightened' Capital Requirements on Large Financial Institutions*, (unpublished manuscript) (May 2010), http://www.people.hbs.edu/shanson/Clearinghouse-paper-final_20100521.pdf.

²⁶³ Valladares, *supra* note 259.

²⁶⁴ See Press Release, FDIC, *FDIC Board Approves Basel III Interim Final Rule and Supplementary Leverage Ratio Notice of Proposed Rulemaking*, FDIC (Jul. 9, 2013), available at <http://www.fdic.gov/news/news/press/2013/pr13060.html>.

their bank holding subsidiaries' leverage ratios to 5% and 6% respectively.²⁶⁵ Similarly, a bill introduced by Senators Sherrod Brown and David Vitter also called for higher capital requirements, seeking to impose a 15% capital-to-assets ratio on all megabanks,²⁶⁶ a suggestion to which many objected.²⁶⁷ Indeed, for most banking institutions, a 15% capital-to-assets ratio seems too high, but for TBTF banks a 15% capital-to-assets ratio is hardly adequate given the systemic repercussions that would follow the failure of such a megabank.²⁶⁸ But while no drastic changes have yet been made on the capital front, at least on the liquidity front changes were made, and on October 24, 2013, the Federal Reserve Board approved a rule regarding TBTF banks' liquidity positions.²⁶⁹ This approved rule is stricter than the Basel Committee's rule and would apply to a wide range of internationally active U.S. financial institutions.

In Summer 2013, several months prior to this rule's approval, the Bank of International Settlements also took steps to tighten capital and liquidity criteria when it released revisions to its Basel III leverage ratio framework and disclosure requirements.²⁷⁰ These revisions included new guidelines that require banks to calculate high quality capital—retained earnings and common equity—in a way that will cover not only on-balance sheet assets, but also a broad range of off-balance sheet instruments. This method of calculation *de facto* requires banks to disclose publicly the different components included in their leverage ratio.²⁷¹

While it is very appealing to believe that by altering the capital and li-

²⁶⁵ *Id.*

²⁶⁶ See Brown, *supra* note 99.

²⁶⁷ See Davis Polk, *Brown-Vitter Bill: Commentary and Analysis 2, 2013* (Apr. 30, 2013), available at http://www.mycorporateresource.com/index.php?option=com_content&view=article&id=128449:davis-polk-brown-vitter-bill-commentary-and-analysis&catid=1370:dodd-frank-banking-reform&Itemid=203159.

²⁶⁸ See generally *Examining the GAO Report on Government Support for Bank Holding Companies: Hearing Before S. Comm. On Banking, Housing, & Urban Affairs*, 113th Cong. (2014), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113shrg93180/pdf/CHRG-113shrg93180.pdf>.

²⁶⁹ Skadden Arps Slate Meagher & Flom, *Federal Reserve Proposes Bank Liquidity Requirements That Exceed the Basel III Standard*, SKADDEN, ARPS, SLATE, MEAGHER & FLOM LLP & AFFILIATES 1 (Oct. 24, 2013), available at http://www.skadden.com/newsletters/Federal_Reserve_Proposes_Bank_Liquidity_Requirements_That_Exceed_the_Basel_III_Standard.pdf.

²⁷⁰ See Bank for International Settlements, *Revised Basel III leverage ratio framework and disclosure requirements - consultative document* (June 2013) (unpublished document), available at <http://www.bis.org/publ/bcbs251.pdf> (the proposal details leverage ratio calculation framework, new disclosure requirements, and keeping an option open for higher leverage ratio than originally planned).

²⁷¹ *Id.* This change is meant to address the argument that “simply raising the leverage ratio won't necessarily address all problems: What is in the numerator and the denominator makes all the difference. Banks attempt to get many different assets allowed in the numerator and as little covered in the denominator. Disclosure is key if there is any hope that the leverage ratio will have any credibility.” Mayra Rodríguez Valladares, *Why Basel's Latest Leverage Ratio Is Better*, AM. BANKER (Jul. 16, 2013, 3:28 PM), available at <http://www.americanbanker.com/bankthink/why-basels-latest-leverage-ratio-is-better-1060635-1.html>.

quidity requirements we can end the TBTF problem,²⁷² things are not that simple. First, while many disagree with this theory, the megabanks and certain commentators argue that equity markets would not be able to provide the equity that would be required to comply with higher, more specific, capital requirements.²⁷³ Second, even with strict capital requirements and sanctions in place, it would be very difficult to get TBTF banks to value at less than \$700 billion, which is the minimum bank's total assets size that will be regulated under the new Federal proposed rule.²⁷⁴ This is because not only do banks have zero interest in getting below \$700 billion, which would also take forever to accomplish organically, but because operationally it will also be difficult to do, since asset sales of such scale will result in new or more TBTF bank and thus are unlikely to be approved by regulators.²⁷⁵ Third, while TBTF banks will surely try to find ways around any liquidity or capital regulation imposed on them, in the meantime, the capital rules themselves are becoming impossible to understand.²⁷⁶ Fourth, the big

²⁷² See J.V. Rizzi, *Big Banks' Warnings About Leverage Ratio Fail the Smell Test*, AM. BANKER, (Jul. 17, 2013, 2:47 PM), available at <http://www.americanbanker.com/bankthink/big-banks-warnings-about-leverage-ratio-fail-the-smell-test-1060667-1.html> (arguing that a new, higher leverage ratio is "a relatively modest proposal. It can be easily addressed without material capital raises or changes in distribution policy for the few institutions that do not currently meet the requirements.").

²⁷³ Citing Standard & Poor's, Davis Polk said "banks would have to raise \$1.2 trillion in additional equity to meet the Brown-Vitter requirements and that equity markets wouldn't be able to provide that much. It also stated that the proposed bill is not capable of distinguishing between risky and non-risky assets and could result in two banks with vastly different risk profiles holding exactly the same amount of capital." See Jesse Eisinger, *In Brown-Vitter Banking Bill, a Banking Overhaul With Possible Teeth*, N.Y. TIMES (May 1, 2013, 12:00 PM), http://dealbook.nytimes.com/2013/05/01/in-brown-vitter-bill-a-banking-overhaul-with-possible-teeth/?_r=0. The analysis said many banking groups would struggle to raise the common equity required by the bill and that the result would be asset sales, less lending and dilution of existing shareholders. *Id.* It also said Brown and Vitter failed to consider the effect of legal tools and requirements in the 2010 Dodd-Frank financial overhaul. *Id.*

²⁷⁴ According to the Federal regulator's suggested July 2, 2013 proposal: "[u]nder the proposed rule, bank holding companies with more than \$700 billion in consolidated total assets or \$10 trillion in assets under custody (covered bank holding companies) would be required to maintain a tier 1 capital leverage buffer of at least 2 percent above the minimum supplementary leverage ratio requirement of 3 percent, for a total of 5 percent. Failure to exceed the 5 percent ratio would subject covered BHCs to restrictions on discretionary bonus payments and capital distributions. In addition to the leverage buffer for covered BHCs, the proposed rule would require insured depository institutions of covered BHCs to meet a 6 percent supplementary leverage ratio to be considered 'well capitalized' for prompt corrective action purposes. The proposed rule would currently apply to the eight largest, most systemically significant U.S. banking organizations."

See Ted Kaufman, *Can Fed Withstand Pressure Of Banks To Weaken New Capital Requirements?*, FORBES (Jul. 26, 2013, 9:30 AM), available at <http://www.forbes.com/sites/tedkaufman/2013/07/26/can-fed-withstand-pressure-of-banks-to-weaken-new-capital-requirements/>.

²⁷⁵ See, e.g., Barbara A. Rehm, *An Alternative Plan to Fix TBTF: Lay Big Banks' Subsidy Bare*, AM. BANKER (Jul. 24, 2013, 2:14 PM), available at http://www.americanbanker.com/issues/178_142/an-alternative-plan-to-fix-tbtf-lay-big-banks-subsidy-bare-1060847-1.html.

²⁷⁶ *Id.* (arguing that these rules include "a dozen separate ratios or surcharges and several different ways to calculate a capital ratio's denominator. No one can even explain how the "new" leverage ratio

banks argue that increasing capital requirement would reduce credit availability and encourage greater risk taking to restore earnings.²⁷⁷ And while commentators such as Carnegie Mellon University Professor Allan Meltzer argue that it is the Federal Reserve that determines the volume of lending, and that the banks that bear the cost of bad decisions rather than the public,²⁷⁸ these arguments should still be carefully examined. Finally, certain commentators argue that while lack of capital has not been a “key attribute” of historically failed banks,²⁷⁹ higher capital requirements will place U.S. banks at a competitive disadvantage to their foreign equals,²⁸⁰ adversely impact banks’ returns and lending abilities, and therefore negatively affect the entire U.S. economy.²⁸¹

B. Shifting the Focus to the TBTF Creditors

A second widely discussed suggestion to the TBTF problem focuses on SIFIs’ creditors,²⁸² and proposes to make them take losses when SIFIs run into trouble.²⁸³ Arguably, this would make investors more likely to

adopted [in summer 2013] relates to the old one. And honestly no one knows how much capital is “enough.”); Barbara A. Rehm, *How to Stop Banks from Gaming New Capital Rules*, AM. BANKER (Aug. 1, 2013, 3:19 PM), available at http://www.americanbanker.com/issues/178_148/how-to-stop-banks-from-gaming-new-capital-rules-1061045-1.html (arguing that the capital rules are too complicated – just the latest Basel III rule alone is 971 pages – and this complication makes it easier for banks to manipulate the rule); Guillermo Ordoñez, *Sustainable Shadow Banking* 6 (NBER Working Paper No. 19022, 2015), available at <http://www.sas.upenn.edu/~ordonez/pdfs/Shadow.pdf> (arguing that “banks can always find ways around regulation”); Jeff Cox, *How Wall Street Will Beat the New Financial Regulations*, CNBC (Jul. 28, 2010, 10:15 AM), available at <http://www.cnbc.com/id/38438525>; Matt Levine, *Who Would You Rather Trust: Bankers Or Regulators?*, N.Y. TIMES, (May 7, 2013), available at <http://dealbreaker.com/2013/05/who-would-you-rather-trust-bankers-or-regulators/> (“bankers, of course, always think that it would be efficient for them to find ways around regulation.”); Floyd Norris, *After the Deal, the Focus Will Shift to Regulation*, N.Y. TIMES, (Sept. 29, 2008), available at <http://dealbook.nytimes.com/2008/09/29/after-the-deal-the-focus-will-shift-to-regulation> (discussing “Wall Street’s finding ways around regulation by establishing new products.”).

²⁷⁷ See *Examining the GAO Report on Government Support for Bank Holding Companies: Hearing Before S. Comm. On Banking, Housing, & Urban Affairs*, 113th Cong. 124 (2014) (statement of Allan H. Meltzer, Professor of Political Economy, Carnegie Mellon University Tepper School of Business), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113shrg93180/pdf/CHRG-113shrg93180.pdf>.

²⁷⁸ *Id.*

²⁷⁹ Mark W. Olson, *Banking Industry Overly Focused on Capital*, AM. BANKER (Jul. 18, 2013, 1:45 PM), available at <http://www.americanbanker.com/bankthink/banking-industry-overly-focused-on-capital-10607001.html> (arguing that the ideal capital position is one that provides an appropriate buffer against losses, but also allows for an acceptable market return on the banks’ invested capital.).

²⁸⁰ J.V. Rizzi, *supra* note 272.

²⁸¹ *Id.*

²⁸² See generally Paul Melaschenko & Noel Reynolds, *A Template for Recapitalising Too-Big-to-Fail Banks*, BIS Q. REV., June 2013, available at http://www.bis.org/publ/qtrpdf/r_qt1306e.pdf.

²⁸³ Jackson & Skeel, Jr. et al., *supra* note 43, at 437 (“bail-in is a form of administrative resolution, but it is designed to serve as a mid-course correction to preserve a troubled financial institution rather than as a full-blown, administrative resolution. The most prominent proposals assume that regulators

weigh-up the likelihood of megabanks' investments as such that are subject to mandatory write-down and expect returns commensurate with such risks, unlike now when investors lend to SIFIs expecting low risks because SIFIs can always be bailed-out.²⁸⁴ This notion has been advocated by U.S. government officials as one of the lessons learned from the 2008 financial crisis.²⁸⁵ This type of a solution was also adopted in recent U.S. and EU bail-in rules.²⁸⁶ The bail-in concept is partly based on empirical findings that equity and subordinated bondholders would have been the biggest losers from the €535 billion damage losses realized by failed European financial institutions.²⁸⁷ But such findings also show that losses attributed to senior debt holders would have been relatively insignificant, and that the depositors would have not been subject to losses at all.²⁸⁸

There are several potential problems, however, with bail-ins, which shift the focus to the creditors and makes them take the losses. First, using this method could result in banks increasing the interest rates they pay in order to raise the money they lend to customers, as bank investors would need to price in the risk of losing their money.²⁸⁹ Second, currently, little is

will determine when to intervene, and would dictate which claims could be altered and which could not.”). The structure of bail-ins differs from contingent capital liabilities, which provide for contingent conversion (CoCos) to equity in the case of failure. Although a conversion trigger is required in both cases, CoCos are designed and purchased by investors on the basis of possible conversion from debt to equity, with maximum losses equivalent to the notional security face value. A bail-in would result in mandatory conversion with the total write-down level that will be set by the level of the institution's losses. See Conlona et al., *supra* note 43.

²⁸⁴ See Conlona et al., *supra* note 43.

²⁸⁵ See, e.g., Ian Katz, *U.S. Treasury's Miller Says Too-Big-To-Fail Bailouts Are Over*, BLOOMBERG (Apr. 18, 2013, 7:30PM), available at <http://www.bloomberg.com/news/2013-04-18/u-s-treasury-s-miller-says-too-big-to-fail-bailouts-are-over.html>. In Spring 2013, U.S. Treasury Department official Mary Miller argued that “[a] common use of the too-big-to-fail shorthand is the notion that the government will bail a company out if it is in danger of collapse because its failure would otherwise have too great a negative impact . . . With respect to this understanding of too-big-to-fail, let me be very clear: It is wrong . . . No financial institution, regardless of its size, will be bailed out by taxpayers again . . . Shareholders of failed companies will be wiped out; creditors will absorb losses; culpable management will not be retained and may have their compensation clawed back”. *Id.*

²⁸⁶ See, e.g., Jim Fuchs, *From Bailouts to Bail-ins: Will the Single-Point-of-Entry Concept End “Too Big To Fail”?*, CENT. BANKER, FEDERAL RESERVE BANK OF ST. LOUIS (Summer 2013), available at <http://www.stlouisfed.org/publications/cb/articles/?id=2410> (meant to solve the TBTF problem, the new American “SPOE strategy is, in essence, a bail-in strategy because it implements a resolution process that imposes losses on shareholders and unsecured creditors”); James Kanter & Jack Ewing, *Europe's Bank Deal Is Seen as Progress With Flaws*, N.Y. TIMES, June 27, 2013, available at http://www.nytimes.com/2013/06/28/business/global/european-banking-deal-is-seen-as-progress-with-flaws.html?_r=0 (“[t]he priority will be to make the creditors and owners responsible, and we get away from taxpayers always putting up for the banks.”); Melaschenko, *supra* note 282. .

²⁸⁷ See Conlona et al., *supra* note 43. These EU bail-in rules are meant to be closely parallel to the FDIC's single point of entry (SPOE) strategy in most respects, which is similar to bail-in, but has distinctive strengths and weaknesses, as further described below.

²⁸⁸ *Id.*

²⁸⁹ *Id.*

known regarding the impact of bail-ins on the different liability holders.²⁹⁰ The lack of objectivity on the trigger for bail-ins is problematic, as without unequivocal quantitative clarity on the trigger for creditor write-downs, investors may request a risk premium in compensation.²⁹¹ Third, there is a significant time-consistency problem. Regulators face a trade-off between placing losses on a small set of taxpayers today (bail-in) or spreading that risk across a much broader set of taxpayers today and tomorrow (bail-out).²⁹² A risk-averse, tax-smoothing administration may prefer the latter path, which historically has been the road taken during crises. Hypothetically, in a future crisis a government might choose the road not taken, but it appears that the financial markets are skeptical about such a possibility, despite the Dodd-Frank Act's language against bail-outs. Thus, the time-consistency dilemma, as perceived by the markets, is as acute as ever.

Finally, the recent EU bail-in approach, and its parallel American SPOE approach have distinctive strengths and weaknesses.²⁹³ The SPOE, about which the FDIC has published a widely anticipated notice on December 18, 2013, deals with resolutions under the Orderly Liquidation Authority (OLA) contained in Title II of the Dodd-Frank Act. In essence, OLA provides a back-up authority to place SIFIs into an FDIC receivership process if there is no private sector option to prevent the SIFIs' default and if the SIFIs' resolution under the Bankruptcy Code would have a significant negative impact on the financial markets' stability. But this strategy is based on the fact that SIFIs are predominantly organized under a holding company structure with a top-tier parent holding company and operating subsidiaries. And according to the SPOE strategy, upon a SIFI's failure, the parent holding company would be put into an FDIC receivership with the SIFI's bank, broker-dealer and other subsidiaries still being open for business. During that time, the FDIC would organize a bridge financial entity into which it would transfer the assets of the failed SIFI's parent entity's estate, including ownership interests in, and intercompany loans to, the

²⁹⁰ *Id.*

²⁹¹ *Id.*

²⁹² See Andrew G Haldane, *Have We Solved 'Too Big to Fail'?*, VOX (Jan. 17, 2013), available at <http://www.voxeu.org/article/have-we-solved-too-big-fail>.

²⁹³ See generally Resolution of Systemically Important Financial Institutions: The Single Point of Entry Strategy, 78 Fed. Reg. 76,614, 76,614–76,624 (Dec. 18, 2013), available at <http://www.gpo.gov/fdsys/pkg/FR-2013-12-18/pdf/2013-30057.pdf> [hereinafter the "Notice"]; Bora Yagiz, *Basel Paper Offers New Look At Bail-In Models For Ailing Institutions*, REUTERS, June 12, 2013, available at <http://blogs.reuters.com/financial-regulatory-forum/2013/06/12/basel-paper-offers-new-look-at-bail-in-models-for-ailing-institutions/> ("this three-step model (recapitalization of the bank, transfer of losses to a holding company, and the sale of the bank) is a hybrid form of two resolution schemes. On the one hand, it has elements of a single point of entry, where a resolution authority would create a bridge holding company and allocate losses to shareholders and unsecured creditors through debt write-off. . . . On the other hand, it resembles the bail-in scheme, where the funding comes from within and not from without.").

subsidiaries.²⁹⁴ And while as part of the process, which the FDIC has viewed as a preferred resolution strategy, measures would be taken to address the issues that led to the failure, I believe that significant challenges still remain.²⁹⁵

First, although the SPOE strategy almost exclusively focuses on holding companies, it is unlikely that holding companies would be the direct source of financial distress, which would warrant the use of OLA. And while resolving holding companies is much easier than resolving operating companies, in order for the SPOE strategy to provide a realistic roadmap to successfully solve the TBTF problem future crises, it must include a realistic description of the process focusing on distress at the operating subsidiary level.²⁹⁶ Second, it is not clear how the SPOE would handle a situation such as Lehman's, where financial distress infects the entire family of entities, and it is difficult to determine which specific entity has failed.²⁹⁷ Third, the SPOE suggests that distressed operating subsidiaries would be recapitalized by the forgiveness of intercompany debt owed to the holding company. This means that sufficient intercompany debt is needed as well as capable executives that would know exactly when and where to direct it to, when cosigning the debt. In addition, specifications on how to recapitalize such subsidiaries beyond the forgiveness of intercompany debt should also be carefully structured. According to Seton Hall University professor Stephen Lubben, this might involve the controversial forming of a new, post-OLA intercompany debt funded by the parent entity's own borrowing; and professor Lubben believes that this raises a legitimate concern that such lending could turn out to be a disguised bailout. If one of the operating subsidiaries is insolvent its equity has no value, which can support a loan and that means that other operating subsidiaries with value would be needed support a secured loan, but it is not clear what would happen if there was not enough value to support liquidity needs.²⁹⁸ Fourth, the SPOE strategy chooses to ignore the existence of situations in which it would make more sense to have the OLA administration impact more than just a holding company and subject an operating subsidiary to receivership proceedings, and even liquidate it if needed, rather than endanger the entire family's

²⁹⁴ *Id.* The Dodd-Frank Act authorizes the FDIC to establish a "bridge financial company" to temporarily succeed to selected assets and liabilities of the SIFI. 12 U.S.C. § 5390(h) (2014).

²⁹⁵ In May 2012, FDIC Chairman indicated that SPOE is the FDIC's preferred resolution strategy under OLA. See Martin J. Gruenberg Acting Chairman, FDIC, Remarks to the Federal Reserve Bank of Chicago Bank Structure Conference (May 10, 2012), available at <http://www.fdic.gov/news/news/speeches/chairman/spmay1012.html>.

²⁹⁶ Stephen J. Lubben, Thoughts on Single Point of Entry, comment letter submitted to the FDIC in response to their Single Point of Entry (SPOE) Strategy for implementing Dodd Frank's Orderly Liquidation Authority (Federal Register/Vol. 78, No. 243), (Feb. 7, 2014), available at <http://ssrn.com/abstract=2392450>.

²⁹⁷ *Id.*

²⁹⁸ *Id.*

functioning.²⁹⁹ Fifth, the SPOE supports the concept of a sale rather than capitalization of material SIFI's assets, but it may be tricky to find acquirers with the desire and financial ability to make the acquisition even if the regulators were willing to permit it.³⁰⁰ Sixth, although the SPOE strategy eliminates some of the other strategies' concerns, such as long proceedings that result in the loss of going concern value for creditors, and the loss of critical services provided by the SIFI, it could be impaired by potential ring-fencing by non-U.S. authorities that have jurisdiction over SIFIs' or their assets.³⁰¹ And while the FDIC attempts to address this international risk by suggesting a multiple point of entry (MPOE) approach, it is not always easy to identify in advance which strategy is preferred—SPOE or MPOE—as the successful implementation of a chosen strategy will depend on a range of considerations. Additionally, even if an MPOE strategy is adopted, the FDIC is likely to encounter serious implementation problems due to the difficulties of cross-border cooperation, and inconsistencies might undermine the approach's effectiveness.³⁰² Finally, since OLA is meant to “backstop” the normal bankruptcy process, regulators still need to improve Chapter 11's ability of to handle large financial institutions.³⁰³

C. Activities and Size Restrictions

A third potential line of solutions attempts to restrict banks' activities, size, or both, in order to reduce the risks they pose to the financial system.³⁰⁴

1. Big Banks' Activities

Limiting banks' activities mainly means restricting non-traditional banking activities. This is the aim of the Volcker rule, which is meant to affect how megabanks do business—and the danger that their trading bets

²⁹⁹ *Id.* (note, however, that on page 76,623 of the proposal, the FDIC does discuss the possibility of needing to place subsidiaries in receivership proceedings and exposing them and their stakeholders to losses, but as noted by professor Lubben, this seems to undermine parts of the SPOE strategy.).

³⁰⁰ See *FDIC Board Releases Single Point of Entry Resolution Strategy for Public Comment*, Shearman & Sterling LLP (Dec. 20, 2013), available at <http://www.shearman.com/en/newsinsights/publications/2013/12/fdic-releases-single-point-of-entry-resolution>.

³⁰¹ *Id.*

³⁰² “The F.D.I.C. has received an expression of potential cooperation from the Bank of England. Unfortunately, this and other vague statements are unlikely to hold up under the pressure of many real world situations. Only a binding treaty on cross-border resolution could really make a difference and this is unlikely for the foreseeable future.” See Financial Services Forum, *supra* note 135.

³⁰³ See generally Stephen J. Lubben, *OLA after Single Point of Entry: Has Anything Changed?* (Ston Hall Univ. Sch. of Law, Research Paper No. 2353035, 2013), available at <http://ssrn.com/abstract=2353035>.

³⁰⁴ See Barth et al., *supra* note 45.

could implode at taxpayers' expense.³⁰⁵ Similarly, regulation initiatives following the principle have recently been considered abroad too, and include the Vickers Commission proposal in the U.K., the Liikanen Report to the European Commission, and draft legislation in France and Germany, all of which attempt to eliminate implicit TBTF subsidies, by suggesting a mandatory separation of commercial banking from securities markets activities.³⁰⁶ Such a limitation addresses the negative incentive that the megabanks have to take excessive risks. This incentive is the result of the government's safety net supporting types of activities that go far beyond the core traditional banking that is necessary for the government to protect.³⁰⁷ And since traditional megabanks' activities provide external social benefits, which arguably justify granting them support, the megabanks have been receiving this support and subsidies as a whole, with no limitations to the specific activities for which the support is intended.³⁰⁸

Also aiming to restrict some of the dangerous megabanks' activities, Sen. Elizabeth Warren introduced a proposal to, *de facto*, repeal large parts of the Gramm-Leach-Bliley Act, which was passed in 1999, and undid the historic Glass-Steagall Act's prohibition on combining banking and commercial activity. Many commentators view departures from Glass-Steagall's prohibition as the root cause of the 2008 crisis, because it enabled megabanks to get involved in riskier operations and activities. Warren has proposed a modern Glass-Steagall Act that would force the megabanks to divest themselves of business lines engaged in non-banking activi-

³⁰⁵ The initial version of the Volcker rule stated that "because bank deposits are federally guaranteed, deposit-taking banks should be restricted from making risky investments . . . [and] [t]he substance of the Volcker Rule was implemented by the Dodd-Frank . . . [which] prohibits banks from "1) engaging in proprietary trading" or "2) acquir[ing] or retain[ing] any equity, partnership, or other ownership interest in or sponsor[ing] a hedge fund or a private equity fund." See Steven L. Schwarcz, *Ring-Fencing*, 87 S. CAL. L. REV. 69, 80 (2013).

³⁰⁶ See Leonardo Gambacorta & Adrian van Rixtel, *Structural Bank Regulation Initiatives: Approaches and Implications* 1–3, 9 (Bank for Int'l Settlements, Working Papers No. 412, 2013), available at <http://www.bis.org/publ/work412.pdf>. Specifically, on Jan. 29, 2014, the EU Commission published a proposal regarding a regulation on structural reform of the EU banking sector. *Id.* Recognizing that "too-big-to-fail" banks still exist, and trying to "refocus. . . banks on their core relationship-oriented role of serving the real economy," the regulation will (i) "[b]an proprietary trading in financial instruments and commodities;" (ii) "[g]rant supervisors the power and. . . obligation to require the transfer of other high-risk trading activities . . . to separate legal trading entities within the group;" and (iii) "[p]rovide rules on the economic, legal, governance, and operational links between the separated trading entity and the rest." See *Proposal for a Regulation of the European Parliament and of the Council on Structural Measures Improving the Resilience of EU Credit Institutions*, COM (2014) 43 final, at 15 (Jan. 29, 2014), available at <http://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:52014PC0043&from=EN>.

³⁰⁷ See generally Thomas M. Hoenig & Charles S. Morris, *Restructuring the Banking System to Improve Safety and Soundness*, FDIC (Dec. 2012), available at <http://www.fdic.gov/about/learn/board/Restructuring-the-Banking-System-05-24-11.pdf>.

³⁰⁸ *Id.* at 3–4.

ties.³⁰⁹ And while the debate continues on whether to put limits on banks' activities and thus affect future banking and merger undertakings, commentators find it difficult to evaluate the cost-benefit ratio, mainly because there is little evidence on either side.³¹⁰

However, even without fully analyzing the consequences of limiting banks' activities, commentators agree on a few points about the consequences of limiting or not limiting banks' activities. First, not limiting banks' activities can positively and negatively impact banks' functioning.³¹¹ Banks that are not limited to certain activities can increase the diversification of their assets and revenue streams and reduce their risks by getting involved in additional undertakings. But, banks' riskiness can also greatly increase their risks if they engage in additional activities that make it difficult to evaluate, monitor, and contain the excessive risk-taking incentivized by the safety net.³¹² Second, there are costs to be expected in terms of reduced liquidity and increased transactions costs, which mean that there will be "less investment, economic growth, and job-creation."³¹³ Third, while there is no proof that limiting banks' activities will result in a simpler and more readily regulated financial system, there is no proof for this.³¹⁴

2. Big Banks' Size

Breaking-up the biggest banks up to reduce risks of a future crisis is a popular suggestion that appeals to base instincts.³¹⁵ And while there are less draconian measures than breaking-up the banks that have not been tried, and might work,³¹⁶ Many argue that breaking-up banks is the most ef-

³⁰⁹ See Press Release, Senators Warren, McCain, Cantwell, and King Introduce 21st Century Glass-Steagall Act (Jul. 11, 2013), http://www.warren.senate.gov/?p=press_release&id=178; U.S. Senator for Mass. Elizabeth Warren, *Fact Sheet* (Jul. 11, 2013), <http://www.warren.senate.gov/files/documents/FactSheet-21stCenturyGlass-Steagall.pdf>

³¹⁰ See Barth, *supra* note 44.

³¹¹ *Id.*

³¹² *Id.*

³¹³ *Id.* at 31.

³¹⁴ *Id.*

³¹⁵ See, e.g., Jonathan R. Macey & James P. Holdercroft, Jr., *Failure is an Option: An Ersatz-Antitrust Approach to Financial Regulation*, 120 YALE LAW L.J. JOURNAL, 1368, 1376 (2011); Travis Waldron, *Democratic Senator Renews Call To Break Up Banks That Are 'Surely Still Too Big To Fail'*, THINK PROGRESS (Feb. 28, 2013, 6:00PM) available at <http://thinkprogress.org/economy/2013/02/28/1655351/sherrod-brown-break-up-banks/> (arguing that "[t]wo decades ago, the six largest Wall Street banks held assets worth just 16 percent of the American economy. . . They now hold assets worth more than 60 percent of the total economy").

³¹⁶ See, e.g., David A. Skeel Jr., *A Better Way to End 'Too Big To Fail', Let the Giant Banks Themselves Choose How to Downsize Their Institutions*, WALL ST. J. (June 3, 2013, 6:45 PM), available at <http://online.wsj.com/articles/SB10001424127887323744604578473311486924532> (suggesting combining two approaches—capital levels and size limitations); Barbara A. Rehm, *Fed's Dudley: Use Deferred Comp to Bolster Capital in Tough Times*, AM. BANKER (Nov. 8, 2013, 4:56 PM), available at

fective way to deal with the TBTF problem.³¹⁷ Moreover, recent banking scandals also demonstrate the difficulties associated with properly governing various activities and controlling the megabanks.³¹⁸ Therefore, although the interconnectedness in, and the fragility of the banking system do need to be addressed separately by some of the measures mentioned in this article—including increasing equity levels—attempting to fix the TBTF problem using only such measures might not be enough. Restructuring the TBTF banks might still be desired because unlike with small banks, letting a big and complex bank fail is not a real option, and threatening to let such a bank go down when there is a crisis is not a credible threat.³¹⁹ Accordingly, even the Dodd-Frank Act mandates that when regulators are unsatisfied with SIFIs' re-submitted living will plans the government can break-up the megabanks that submitted the lacking plans.³²⁰

The proposal to break-up big banks presents several problems. First, a practical issue is how to calculate an appropriate size limit is difficult. Recent studies on the connection between financial depth and growth shed some light on this issue, and suggest that there is a threshold at which the private-credit-to-GDP ratio may start to negatively impact GDP and productivity growth.³²¹

Second, a pending empirical issue is if size limits would erode the economies of scale and scope, which might otherwise be highly associated and affiliated with big banks. The existing literature on these economies of scale has, until recently, indicated they may be exhausted at relatively low balance sheet thresholds. A number of new studies, however, seem to suggest differently suggest with economies of scale found for banks with balance sheets above \$1 trillion.³²² Nevertheless, no clear conclusions can be

<http://www.americanbanker.com/bankthink/feds-dudley-use-deferred-comp-to-bolster-capital-in-tough-times-10635291.html> (Federal Reserve Bank of New York President William Dudley suggested to “structure compensation practices to strengthen senior bank managers’ incentives to proactively manage risk” by withholding executive compensation to cover capital losses).

³¹⁷ See, e.g., Skeel, Rehm, *supra* note 316.

³¹⁸ See generally Nizan Geslevich Packin, *It's (Not) All About the Money: Using Behavioral Economics to Improve Regulation of Risk Management in Financial Institutions*, 15 U. PA. J. BUS. L. 419 (2013).

³¹⁹ Simon Johnson, *The Bankruptcy Exemption*, N.Y. TIMES (Nov. 7, 2013), available at <http://economix.blogs.nytimes.com/2013/11/07/the-bankruptcy-exemption/> (“[B]ankruptcy cannot work for large, complex financial institutions in the United States, at least not using the current bankruptcy code.”).

³²⁰ See generally Packin, *supra* note 10.

³²¹ See, e.g., Jean-Louis Arcand, Enrico Berkes & Ugo Panizza, *Too Much Finance?* (IMF Working Paper WP 12/161, 2012), available at <http://www.imf.org/external/pubs/ft/wp/2012/wp12161.pdf>; Stephen Cecchetti & Enisse Kharroubi, *Reassessing the Impact of Finance on Growth* (Bank for Int'l Settlements Working Papers 381, 2012), available at www.bis.org/publ/work381.pdf.

³²² See, e.g., Guohua Feng & Apostolos Serletis, *Efficiency, Technical Change, and Returns to Scale in Large US Banks: Panel Data Evidence from an Output Distance Function Satisfying Theoretical Regularity*, (2009) 34 J. OF BANKING & FIN. 1, 127–38; (2009); David Wheelock & Paul Wilson, *Do*

made yet, especially because the implicit subsidy might be what could show up as economies of scale. Indeed, a recent study of by the Bank of England research has showed that, once those subsidies are accounted for, evidence of scale economies typically disappears for banks with assets in excess of \$100 .³²³ Moreover, there may even be evidence of scale diseconomies, often referred to as megabanks being “too-big-to-manage.”

Third, megabanks offer their customers products, services, and infrastructure that smaller banks cannot match, from multicity branch networks to global coverage at a consistent cost.³²⁴ According to certain commentators, such as University of Maryland professor Phillip Swagel, the global transaction services that megabanks provide simply could not be recreated as efficiently or as cheaply by smaller banks, or even a patchwork of smaller banks.³²⁵ Accordingly, it might be difficult to break-up megabanks, without sacrificing the their product diversity, large scale, and international reach,³²⁶ or without forcing individual customers into the arms of payday lenders and other, presumably less-scrupulous, non-bank financial services providers.³²⁷

Fourth, certain commentators believe that “[b]oth the legislation and the rules designed to make banks smaller are jeopardizing our standing in the world and our ability to compete.”³²⁸ They argued that if unchecked, regulators pushing to break-up big U.S. banks could result in much “business migrating to non-U.S. banks and the less-regulated shadow banking sector,” which will diminish the role of the U.S. as a significant political and economic superpower.³²⁹

Fifth, it is not clear if whether the megabanks really do pose such a great danger to the economy post-2008 crisis. Unlike in other countries, the

Large Banks have Lower Costs? New Estimates of Returns to Scale for U.S. Banks, (2012) 44 J. OF MONEY, CREDIT, AND BANKING 1, 171–199, (2012).

³²³ Davies & Tracey, *supra* note 158.

³²⁴ Phillip Swagel, *Don't Make Banks Too Small to Succeed*, BLOOMBERG (Sep. 5, 2012, 6:30 PM), available at <http://www.bloomberg.com/news/2012-09-05/don-t-make-banks-too-small-to-succeed.html> (“Philadelphia-based chemical company FMC Corp. (FMC), for example, relies on large banks to fund its \$1.5 billion revolving credit line and to offer worldwide support for its financing needs.”).

³²⁵ *Id.*; Mark Roe, *London Whale is the Cost of Too Big to Fail*, The Harvard Law School Forum on Corporate Governance and Financial Regulation (Mar. 25, 2013 9:28 AM), available at <http://blogs.law.harvard.edu/corpgov/2013/03/25/london-whale-is-the-cost-of-too-big-to-fail/> (“If the banking conglomerates were carved up into their constituent parts, the individual units would have a much higher cost of capital.”).

³²⁶ Charles W. Calomiris, *Debate: Should Big Banks be Broken Up?*, ECONOMIST (May 14, 2013), available at <http://www.economist.com/debate/days/view/977>.

³²⁷ See generally RICHARD X. BOVE, GUARDIANS OF PROSPERITY: WHY AMERICA NEEDS BIG BANKS (2013).

³²⁸ Maria Aspan, *Analyst Dick Bove Defends Big Banks, Slams Regulators* (Jan. 9, 2014, 2:19 PM), <http://www.americanbanker.com/people/analyst-dick-bove-defends-big-banks-slams-regulators-1064796-1.html>.

³²⁹ See Swagel, *supra* note 325.

U.S. financial system is small relatively to the economy it supports, and “[A]ccording to the Federal Reserve, the assets of the top five U.S. banks equal 56% of gross domestic product.”³³⁰ Differently, for example, “the five largest German banks have assets that total 116% percent of GDP and in the U.K., the top five are at 309% of GDP.”³³¹ In addition, in the U.S., growth in the U.S. formal banking sector over the last two decades has “lagged behind the increase in American exports and the gain in the Standard & Poor’s 500 stock index over the same period.”³³²

Finally, when one contemplates how the government would break -up megabanks and how disruptive such break-ups would be to the economy, this proposal seems daunting, especially when considered in the context of the typical political horse-trading culture.

D. Reducing Economy’s Exposure – The Dallas Fed Plan

The Dallas Fed plan,³³³ which was created with the goal of reducing the economy’s exposure to the big banks, includes three main elements. First, it would explicitly restrict the government’s “guarantee” to bank deposits already protected by the FDIC and would prevent any access by the non-depository parts and constituents of the megabanks from accessing to Federal Reserve loans. Second, it would mandate that each corporation, entity, or individual that does business with a big bank sign a statement declaring that they acknowledge that there is no federal guarantee. Third, it would require government regulators to strategize and create incentives for banks to streamline, simplify, and downsize their operations and subsidiaries so that banking affiliates of the financial holding company would be FDIC-certified as “too-small-to-save” in the event of failure.³³⁴

The main advantages of the Dallas Fed plan are that these three steps would help realign incentives away from the current perverse TBTF banks mindset and would re-establish a more competitive framework within the financial sector. In addition, operationally, the Dallas Fed plan could be thought of as a plan to mitigate moral hazard. Nevertheless, it is unlikely that even if adopted as is the Dallas Fed plan, even if adopted as is, would be able to put an end to banking and financial crises. Indeed, despite the advantages of this plan, certain commentators have expressed a fear that in the event of a future crisis, the Federal Reserve and the Treasury Depart-

³³⁰ *Id.*

³³¹ *Id.*

³³² *Id.*

³³³ See *Correcting ‘Dodd–Frank’ to Actually End ‘Too Big to Fail’: Hearing Examining How the Dodd–Frank Act Could Result in More Taxpayer-Funded Bailouts Before H. Comm. on Fin. Services*, 113th Cong. 11 (2013) (statement of Richard Fisher, President and CEO, Federal Reserve Bank of Dallas), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113hhr81769/pdf/CHRG-113hhr81769.pdf>.

³³⁴ *Id.*

ment would still be required to intervene and protect the megabanks in the event of a future crisis, because the objective of the 2008 bailouts was to prevent a broad economic meltdown, rather than to protect depositors and counterparties.³³⁵

E. A Subsidy Reserve Fund

A potential solution that Congressman Michael Capuano recently introduced relies on market discipline.³³⁶ The legislation, which was engineered by Boston University professor Cornelius Hurley and former FDIC Chairman William Isaac, attempts to require SIFIs to set aside balance sheet reserves equal to the net advantage that they get for being SIFIs.³³⁷

Balance sheet reserves are accounting entries that reflect money a business entity sets aside in order to pay future obligations, and are therefore recorded as liabilities. In Congressman Capuano's proposal, this means that each big bank would be required to establish a "subsidy reserve" line item on its balance sheet and add to it every year the estimated subsidy it receives from taxpayers in the form of reduced funding costs. According to the proposal, the subsidy reserve would be calculated based on the "support" versus "stand-alone" ratings currently assigned by credit-rating agencies. Specifically, the Federal Reserve, cooperating with the Financial Stability Oversight Council's Office of Financial Research, would work to "establish a formula for determining the financial benefit" that big firms receive when "shareholders, creditors, and counterparties" believe that the government "will shield them from losses in the event of failure."³³⁸ This is because the amount set aside reflects an earning that the financial institution did not earn. Thus, such reserves would be treated as capital for liquidation purposes but not for regulatory purposes, and would not count towards regulatory capital requirements or be used to pay executives, buy-back shares, or give dividends.³³⁹

According to the proposal, the reserve would accrue year after year and could be distributed to the megabanks' shareholders only in proportion to a bank's shrinkage via asset sales, or divestitures or spin-offs of assets. As the megabanks downsize, however, the pro-rata portion of the reserve fund is to be allocated to the divested assets.³⁴⁰ The only way megabanks

³³⁵ Garver, *supra* note 167.

³³⁶ Subsidy Reserve Act of 2013, H.R. 2266, 113th Cong. (2013).

³³⁷ See, e.g., Barbara A. Rehm, *An Alternative Plan to Fix TBTF: Lay Big Banks' Subsidy Bare*, AM. BANKER, (Jul. 24, 2013, 2:14PM), available at http://www.americanbanker.com/issues/178_142/an-alternative-plan-to-fix-tbtf-lay-big-banks-subsidy-bare-1060847-1.html.

³³⁸ *Id.*

³³⁹ *Id.*

³⁴⁰ Garver, *supra* note 167.

could monetize their reserves is by divesting themselves.³⁴¹

The best aspect of the proposal is that it is self-policing. As the reserve builds up, combined with higher capital and liquidity requirements imposed by regulators, shareholders will be more likely to demand that the reserves be used more efficiently. Accordingly, managers and boards of directors of big banks faced with such shareholders' demands will find themselves needing to choose between: (i) continuing to do business as usual, in which case, the subsidy reserve and the capital will increase to the point at which the big banks become too-safe-to-fail³⁴² or (ii) becoming smaller by getting rid of some of their less profitable operations, selling subsidiaries, or spinning-off divisions to shareholders.³⁴³ Hurley and Isaac believe that in a short time, shareholders are likely to apply pressure on the megabanks receiving the subsidies to become smaller financial institutions. This incentive will make the megabanks want to downsize and divest enough, to reach the point at which they no longer receive the subsidy. As a result, megabanks will be less dangerous and not required to maintain subsidy reserves.³⁴⁴

This proposal: (i) can be readily adopted on a global basis; (ii) relies on self-policing and market discipline, which are key in market-driven economy, as opposed to arbitrary break-up plans and caps on growth; (iii) helps to get incentives right (at least those valued by the Dallas Fed's plan); and (iv) has the additional benefit of enforceability due to its transparency and simplicity. Nonetheless, there are several problems with the proposal. First, and most importantly, there likely will be an intense debate to determine the acceptable methodology for measuring the TBTF subsidy for the purpose of contributing to the reserve fund. Indeed, it is not clear how the Federal Reserve and Financial Stability Oversight Council's Office of Financial Research would calculate and determine the subsidy amount. As described in this article, there are very different methods to measure any TBTF subsidies. Accordingly, estimates done by the Bank for International Settlements, the International Monetary Fund, and certain academics came in between \$50 billion and \$100 billion per year,³⁴⁵ while some commenta-

³⁴¹ William Isaac & Cornelius Hurley, *At last—How America Can Solve the 'too big to fail' Problem*, FIN. TIMES (Jan. 17, 2013 6:46PM), available at <http://www.ft.com/cms/s/0/c87f342e-5fda-11e2-8d8d-00144feab49a.html#axzz2qqt2oXnN>.

³⁴² This option will be favorable to taxpayers and regulators, but will result in lower returns on shareholders' investment.

³⁴³ Pursuant to this option, portions of the subsidy reserve will be allocated to the divested entities.

³⁴⁴ See Rehm, *supra* note 316 ("It will not take long for recalcitrant managers to be challenged by their shareholders demanding the release of this capital through the rightsizing of the institution . . . it is market discipline, not regulators or politicians, making this happen. All this can be accomplished simply by shifting our focus away from arbitrary capital levels and toward the taxpayer subsidy of the TBTFs.").

³⁴⁵ Garver, *supra* note 167.

tors and big banks deny the existence of any subsidies altogether.³⁴⁶ Second, despite the “win-win” rhetoric surrounding this proposal’s two options and its self-regulating element, it is not clear why the megabanks’ shareholders would be so eager to influence SIFIs in an attempt to make them smaller and riskier when they could just invest in other avenues that reflect their interests better. Third, it is not clear how the reserve model could achieve better results than other proposals such as additional capital or forced divestitures that force the shrinkage of megabanks. Fourth, it is unclear how easy it would be for the regulators to enforce this proposal and penalize or impose sanctions against those that do not comply. For example, the Federal Deposit Insurance Corporation, which insures deposits up to \$250,000, failed to collect insurance premiums from most big banks from 1996 to 2006, and tried for years to get congressional authority to collect the premiums in case of a looming crisis.³⁴⁷ Finally, given that balance sheet reserves are recorded as liabilities, which reflect money a business entity sets aside in order to pay future obligations, it should be made clear who whether the big banks would owe their reserve funds to the government, the taxpayers, or perhaps a different party. Insurance companies, for example, set-up balance sheet reserves to ensure they have enough funds set aside to pay-out claims. Thus, their reserves often equal the value of claims that have been filed against the insurance companies, but not paid out yet.

V. TRYING SOMETHING DIFFERENT? USING USER-FEES TO ADDRESS TBTF

A. Introducing the Concept of User-Fees

Each of the approaches described is useful and necessary but it is doubtful that one approach would prove sufficient to tackle the TBTF problem. Accordingly, there is room for an additional proposal, which can and should be used together with other approaches, and is based on requiring TBTF banks to pay user-fees. User-fees are prices a governmental agency charges for a service or product whose distribution it controls.³⁴⁸ User-fees link cost to benefit. Those who use the service pay for it and those who do

³⁴⁶ See, e.g., STOGIN *supra* note 13; Policy Brief *supra* note 13.

³⁴⁷ See, e.g., Julie Crawshaw, *FDIC Failed to Collect Premiums for Years*, MONEYNEWS (Mar. 16, 2009, 02:54PM), available at <http://www.moneynews.com/StreetTalk/bair-fdic-premiums/2009/03/16/id/328841>.

³⁴⁸ “Recently, the federal government has developed substantial interest in financing through user fees a variety of the services it provides.” Clayton P. Gillette & Thomas D. Hopkins, *Federal User Fees: A Legal and Economic Analysis*, 67 B.U. L. REV. 795, 796 (1987) (“Recently, the federal government has developed substantial interest in financing through user fees a variety of the services it provides.”).

not use the service are not forced to pay for it.³⁴⁹ Therefore, user-fees are not as coercive as most other forms of taxation, which require mandatory payments.³⁵⁰

User-fee models are not new. For example, in 1992, the Prescription Drug User Fee Acts made the FDA dependent on funding from pharmaceutical firms, while deepening the FDA's regulatory capture. Congress adopted that legislation, which might have enabled an enhancement of the FDA's supervision powers with more review staff³⁵¹ that could quickly and proficiently examine applications to market new drugs. Congress did so after the FDA came under criticism for taking too long to rule on new-drug applications, and mainly for enabling consumers to purchase and use insufficiently tested drugs, which proved to have risky side effects that were undiscovered until the drugs were in general use.³⁵² To address these systemic problems, the FDA used the user-fees to increase the volume and depth of its work, examining the products of the industry's participants.³⁵³

As demonstrated in the FDA example, another important advantage of user-fees is that they shift large parts of the cost of regulation to the industry's participants that need to be supervised by a regulating agency.³⁵⁴ This burden-shifting and the less coercive elements of user-fees in comparison to traditional taxes are the main reasons that the user-fees are becoming increasingly popular as a solution when enhanced regulatory supervision of a certain industry is needed.³⁵⁵ A recent illustration of this growing populari-

³⁴⁹ Robert W. McGee, *Taxation and Public Finance: A Philosophical and Ethical Approach*, 1 Commentaries on the Law of Accounting & Finance 157, (1997), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=461340 (discusses the pros and cons of the various forms of taxation including user-fees).

³⁵⁰ *Id.*

³⁵¹ See 21 U.S.C. §§ 379g-h (2000); Eric R. Claeys, *The Food and Drug Administration and the Command-and-Control Model of Regulation*, 49 ST LOUIS U. L.J. 105, 129, (2004).

³⁵² See generally U.S. GOV'T ACCOUNTABILITY OFFICE, GAO/PEMD-96-1, FDA DRUG APPROVAL: REVIEW TIME HAS DECREASED IN RECENT YEARS (1995); Richard Dorsey, *The Case for Deregulating Drug Efficacy*, 242 AM. MED. ASSOC. 1755 (1979); Mary K. Olson, *Regulatory Agency Discretion among Competing Industries: Inside the FDA*, 11 J.L. Econ. & Org. 379 (1995).

³⁵³ Marc A. Rodwin, *Institutional Corruption and the Pharmaceutical Policy*, 41 J.L. MED. & ETHICS 544, 546 (2013).

³⁵⁴ Patrick O'Leary, *Funding the FDA: Assessing the User Fee Provisions of the FDA Safety and Innovation Act of 2012*, 50 HARV. J. ON LEGIS. 239, 249 (2013); DIV. OF INV. MGMT., U.S. SEC. AND EXCHANGE COMM'N, STUDY ON ENHANCING INVESTMENT ADVISER EXAMINATIONS 25-29 (2011) [hereinafter SEC Staff Study], available at <http://www.sec.gov/news/studies/2011/914studyfinal.pdf>. "User fees are a vital part of the FDA's mission today. They accounted for thirty-five percent of the agency's total budget in FY 2012 and under President Obama's FY 2013 proposed budget over \$1.9 billion in fees would account for forty-four percent of the agency's budget and pay for over 4,700 full-time equivalent employees." *Id.*

³⁵⁵ "User fees are an important source of resources for many other federal government agencies. For example, user fees fund inspections of banks conducted by the Office of Comptroller of the Currency, examinations of credit unions by the National Credit Union Administration, inspections of nuclear facilities by the Nuclear Regulatory Commission, inspections of national marine fisheries by the National

ty is the SEC's recommendation, under the direction of Section 914 of the Dodd-Frank Act, which required the SEC to study options for overseeing broker-dealers and investment advisers, to consider imposing user-fees on SEC-registered investment advisers.³⁵⁶

B. User-Fees and Big Banks

While there have been many attempts to create rules on an adequate resolution authority to address failing SIFIs, this objective has not yet been achieved. Nevertheless, in order to better monitor and grasp the levels of risks taken by SIFIs and assess the scope of the implicit benefits they receive, and how they impact the financial markets, imposing user-fees on SIFIs to fund an appropriate overseeing body's efforts to do exactly that, could be very efficient. In addition, as further detailed below, I believe such an approach can help shift some of the burden to reduce the subsidies to the biggest banks themselves.

For this article's purpose I would assume that the appropriate overseeing body could be the Financial Stability Oversight Council (the "Council"). The Council could charge user-fees for government guarantees, effectively transforming implicit guarantees into explicit ones.³⁵⁷ The Council would then use the fees collected for the following three purposes. First, although the user-fees are not meant to be high enough to fully offset the TBTF subsidies, the Council could use parts of the banks' fees as contributions toward a resolution fund, to which a certain portion of the fees would be added annually to offset part of the implicit subsidies. Arguably, having such a fund available, even if it is very partial, increases the willingness of authorities to engage in resolution, in turn, reducing the likelihood of bailout. Second, the Council could enhance its SIFIs' supervision, which might only have a limited effect on the implicit subsidy, or on the TBTF problem, but would nonetheless directly reduce the probability of distress. Third, relatedly, the user-fees could help enhance transparency and disclosure requirements, which would ideally help reduce unnecessary bailouts. Specifically, the Council could monitor the extent of the various explicit and implicit subsidies provided to each SIFI and conduct special examina-

Oceanic and Atmospheric Administration, and quality examinations of agricultural commodities and processing plants by the Department of Agriculture." SEC Staff Study, *supra* note 354, at 25–26.

³⁵⁶ See Clifford J. Alexander & Arthur C. Delibert, *SEC Recommends 'User Fees' or SRO Model to Facilitate Compliance Examinations*, MONEY MANAGER'S COMPLIANCE GUIDE, Feb. 2011, at ¶110 (noting the SEC liked the user fees options because registered investment advisers currently bear little of the cost of their regulatory oversight as compared to other groups of participants in the financial services markets).

³⁵⁷ See Sebastian Schich & Sofia Lindh, *Implicit Guarantees for Bank Debt: Where Do We Stand?*, 1 OECD J. FIN. MKT. TRENDS 15 (2012), available at <http://www.oecd.org/finance/financial-markets/Implicit-Guarantees-for-bank-debt.pdf>.

tion of their books, records and activities, that would be designed to: (i) improve compliance with any subsidies' guidelines; (ii) prevent fraud using the subsidies' guidelines, or relying on the safety net; (iii) monitor risk resulting from the SIFIs' operations and reliance on the subsidies; and (iv) inform regulatory policy concerning the subsidies. Such examinations should include making sure that there is minimal inappropriate transfer of federal subsidies from institutions that benefit from government subsidies to unregulated entities. Additionally, the user-fees could provide the Council with the resources to perform earlier examinations of potentially problematic issues related to the subsidies, and their impact on the various banks' profitability, business models, and strategies. User-fee funds would also enable more frequent examinations of the various explicit and implicit subsidies given to each SIFI, and that examinations might provide a greater level of deterrence of wrongdoing, as banks would acknowledge that they are subject to frequent examinations. Moreover, frequent examinations of SIFIs could help address various issues at earlier stages and, in some cases, limit the amount of losses and obstruction to the financial markets.

Under this approach, the Council would continue to rely on appropriated funds to support its other programs, but the user-fees collected from the various SIFIs would be available to the Council without further appropriation, used solely to fund the Council's TBTF subsidies examination program, and set at a level designed to achieve an acceptable frequency of examinations. User-fees also could provide resources that would permit the Council to improve and upgrade the efficiency and success of its examinations by using long-term strategic planning that would enable the Council to better utilize both technology and its workforce.³⁵⁸ Training its staff and financially investing in better technology could assist the Council to better understand and evaluate increasingly sophisticated financial products and complex investment banking strategies pursued by SIFIs. Critical technology-based solutions typically take years to install and perfect—a predictable and steady source of funding could enable the Council to more easily develop and deploy such solutions.³⁵⁹

Additionally, stable resources could offer the TBTF subsidies' examination program increased flexibility to respond to developing and emerging risks related to the TBTF banks, the stability of the financial markets, and to direct staffing and strategic responses that may help address critical issues.³⁶⁰ Particularly, the examination program would be better situated to assign necessary resources and staff to address identified risks because the program would foster its own experts who know best how to mitigate the

³⁵⁸ For guidance on how the user-fees could be used see SEC Staff Study, *supra* note 354; SEC Staff, *Enhancing Investment Adviser Examinations*, 2011 WL 216287 (C.C.H.), Jan. 20, 2011.

³⁵⁹ *Id.*

³⁶⁰ *Id.*

risks of TBTF banks.³⁶¹

Moreover, retaining exclusive responsibility of the Council to conduct SIFIs' subsidies examinations (funded by user-fees) may avoid certain problematic issues associated with delegating examination responsibilities or coordinating supervisions between various bodies, which might include not only direct costs required for the monitoring, but also other costs that are even more difficult to quantify. Indeed, for example, in 2012 JPMorgan lost billions of dollars as a result of excessive risk-taking, even as regulators struggled to implement the Dodd-Frank Act's Volcker rule that tries to prevent banks from speculating in such financial derivatives.³⁶² JPMorgan's trades got around the rule by labeling the risky bets as "hedged," and the loss took place despite the scrutiny of 110 regulators domiciled inside JPMorgan from several federal agencies.³⁶³

C. Calculating the User-Fees

Similarly to the Subsidy Reserve Fund proposal, when adopting a user-fee model, a potential critical difficulty could be to how to determine what subsidies the TBTF banks receive and thus what the subsidy-related fees should be. Nevertheless, for the purpose of setting user-fees, I suggest adopting a somewhat efficient and straightforward method that helps avoid dealing with a controversial subsidies calculation. No levels of subsidies will be calculated, and instead banks would pay fees calculated in the same way that real estate taxes are currently being assessed by local governments,³⁶⁴ based on the assessed value of each bank and a mill-rate-assessed-value.³⁶⁵ Thus, based on a percentage of their value, banks valued at more

³⁶¹ *Id.*

³⁶² See Packin, *supra* note 318.

³⁶³ *Id.*

³⁶⁴ *Taxes, Fees, Assessments, Dues, and the "Get What You Pay For" Model of Local Government*, 56 FLA. L. REV. 373, 380 (2004) ("At the local level, the predominant form of taxation is the property tax, which is levied as a percentage rate against the assessed value of each parcel of land (and its improvements) located within the taxing unit's territorial jurisdiction.")

³⁶⁵ There are several methods to estimate banks' value. For example, the OCC typically uses three methods to calculate the value of banks' shares when under 12 U.S.C. §§ 214(a) and 215(a), shareholders dissenting to a conversion, consolidation, or merger involving a national bank request the bank's shares valuation. SEE ADMIN. OF NAT'L BANKS, U.S. OFFICE OF THE COMPTROLLER OF THE CURRENCY, BANKING BULLETIN 88-22, OCC VALUATION METHODS – 1985-1986 (1988) [hereinafter BANKING REP.]. First, the market value of shares being appraised, which can be based on direct quotes from a market-maker, if sufficient trading in the shares exists and the prices are available. And courts have held that states' taxing statutes provide that "value" in the context of bank shares should mean reasonable cash market value. *Id.*; *American Bank & Trust Co. v. Dallas County*, 679 S.W.2d 566, 570 (Tex. App. 1984). Second, the investment value method, which "requires an assessment of the value to investors of a share in the future earnings of the target bank . . . estimated by applying an average price/earnings ratio of banks with similar earnings potential to the earnings capacity of the target bank." See BANKING REP. Third, the adjusted book value method, which is calculated by multiplying the book

than a pre-determined TBTF-qualifying minimum value would pay user-fees. The higher the bank valuation is the higher the user-fees it would be presumed to need to pay.

D. TBTF User-Fees: Concerns and Advantages

The central problem with the user-fee system, aside from doubts about its actual effectiveness, arises from the fact that it consists of having industry provide the operating funds the federal regulator needs to do its day-to-day work, with strings attached. This problem has one main principal aspect, which is that for SIFIs that paid their user-fees, paying such fees might create an implicit obligation on the part of regulators to bail-out the paying SIFIs in the event of distress. In other words, the payment or non-payment of user-fees can create expectations on the part of regulators.³⁶⁶ In order to prevent the creation of such expectations, the regulators should make it clear that complying with the user-fee regulation is mandatory and does not merit any additional financial assistance from the government under any circumstances. Paying user-fees should be viewed similarly to paying taxes—a legal duty that if ignored might result in severe legal consequences. While in theory such a concern is legitimate, assessing it in a real-world perspective appears to make it seem meaningless. Indeed, following the financial crisis the government and regulators have been repeatedly promising “no more bailouts.” Even President Obama, in multiple speeches, has accepted the argument that the most important goal for financial reform is to prevent future bailouts.³⁶⁷ But despite this very clear message, the existence of the TBTF subsidies is the best indicator of the fact that investors and big financial institutions, as well as the general public do not believe this government’s promise to be the case. Hence, whether or not paying user-fees would create additional expectations among large financial institutions about getting bailed out is irrelevant, as such expectations are already in existence, despite the administration’s efforts to prove differently.³⁶⁸

In addition, there are several distinct advantages in adopting such a simple method. First and foremost, this proposal could be used together

value—assets’ historical acquisition costs—of the “target bank’s assets per share times the average market price to book value ratio of comparable banking organizations.” *Id.*

³⁶⁶ Such a problem has also been raised in the context of the FDA. See O’Leary, *supra* note 354.

³⁶⁷ Floyd Norris, *No More Bailouts?*, N.Y. TIMES (April. 22, 2010, 12:24 PM), available at <http://economix.blogs.nytimes.com/2010/04/22/no-more-bailouts/>; Ryan Tracy, *Dodd and Frank: No Government Bailouts Allowed*, WALL. ST. J. (Mar. 31, 2014 5:48 PM), available at <http://blogs.wsj.com/moneybeat/2014/03/31/dodd-and-frank-no-government-bailouts-allowed/> (“We did, I believe, the maximum that you could do legally to make clear that if a large financial institution incurs debts it cannot pay, it is out of business and no taxpayer money can be used.”).

³⁶⁸ See Tracy, *supra* note 367 (“If ‘too big to fail’ is defined as ending public bailouts of large financial institutions, the law says that,” Mr. Pawlenty said. The markets can “choose to believe it or not.”).

with other approaches and proposals. For example, if a user-fee system were in place, capital requirements presumably would not need to be quite as high as they should be without a user-fee system. Second, a similar system already exists for taxing purposes, and business entities already know how to work the various functions of that system. Third, such a system has a self-policing element to it, which enables the big banks' executives and managements to figure out what they want their assets and values to be, given this new tax in the mix of competing issues, such as executives' pay.³⁶⁹ Fourth, big banks that have foreign subsidiaries would be required to pay user-fees that would be calculated on their asset value of the foreign subsidiary. Doing so would make it very difficult for big banks to hide profits off-shore, as it is not their profits that are not being assessed for the mandatory user-fees, but the assets' values. Fifth, similarly to the FDA's guidelines, the supervising agency should permit waiver of or reduction in one or more user-fees assessed where it finds that a big financial institution meets the eligibility criteria.³⁷⁰ Indeed, the purpose of the user-fees is to sponsor a government agency's work supervising SIFIs and better monitor how it manages risk, while also shifting some of the regulation-compliance burden to the SIFIs, incentivizing them to internally reduce some of the TBTF perverse effects. And the tax, user-fees that each SIFI would need to pay, would be based on the assumption that if a SIFI is valued at more than a certain threshold amount, which would be set at \$100 billion,³⁷¹ it is probably viewed by the public as a TBTF bank and, has a significant market share in, and impact on, the financial global markets. This is because TBTF subsidies negatively impact the entire society, but the biggest financial institutions are not taking responsibility for their involvement with this phenomenon, although they should.

³⁶⁹ Equity-based awards, coupled with the capital structure of banks, tie executives' compensation to a highly levered bet on the value of banks' assets and impact the executives' incentives. See generally Lucian A. Bebchuk & Holger Spamann, *Regulating Banker's Pay*, 98 GEO. L. J. 247 (2010).

³⁷⁰ "According to section 736(d) of the Act, FDA will grant a waiver of or reduction in one or more user fees assessed under section 736(a) of the Act where it finds that an applicant meets the eligibility criteria . . ." U.S. DEP'T OF HEALTH & HUMAN SERVS., ET AL., OMB CONTROL NO. 0910-0693, GUIDANCE FOR INDUSTRY: USER FEE WAIVERS, REDUCTIONS, AND REFUNDS FOR DRUG AND BIOLOGICAL PRODUCTS 4 (2011), available at <http://www.fda.gov/downloads/Drugs/GuidanceComplianceRegulatoryInformation/Guidances/ucm079298.pdf>.

³⁷¹ I believe that \$100 billion should be the minimum threshold above which a bank would have to comply with the user-fees regulation. This number is not random. It is based on the Federal Reserve and Federal Deposit Insurance Corp. determination that banks with at least \$50 billion in total consolidated assets but less than \$100 billion in nonbank assets are unlikely to shake the financial system in a collapse, and hence can follow a template to write tailored Dodd-Frank Act required resolution plans and living wills. Thus, banks that are worth less than that would be exempt from the user-fees, as it appears that the regulators view their share in, and impact on, the markets as less dramatic. See Jesse Hamilton, *U.S. Banking Agencies Issue Template for Bank 'Living Wills'*, BLOOMBERG (Sept. 3, 2013, 2:48 PM), available at <http://www.bloomberg.com/news/2013-09-03/u-s-banking-agencies-issue-template-for-bank-living-wills-1-.html>.

The TBTF subsidies essentially impact taxpayers, which end-up paying the biggest SIFIs' subsidies cost. Based on basic torts law theory, plaintiffs have traditional remedies available against identifiable tortfeasors. However, when plaintiffs have no other remedy, numerous courts have applied market-share theories, which depart from the common law requirements of causation and product identification.³⁷² They held that market-share permits a defendant to be held liable based on its share of the relevant business market, without proof that the defendant's business caused the alleged damage.³⁷³ In the TBTF- banks context, the tortfeasors are the biggest banks that hurt the economy and the taxpayers, and so if their value is higher than the minimum set amount, they will be presumed to be dangerous TBTF institutions and will be required to pay user-fees. Nevertheless, similarly to the market-share theory in torts, a defendant may exculpate itself from liability by establishing through, by a preponderance of evidence, that it is not a TBTF bank, and hence not partly responsible for the TBTF subsidies' problem. And if a SIFI were able to do so, showing that it does not enjoy any TBTF subsidies' benefits, and does not burden taxpayers and society, such a SIFI would be exempt from paying the user-fees.³⁷⁴ Therefore, a great advantage of the user-fee model is that if a SIFI is required to pay user-fees, but is able to prove based on pre-determined criteria that it does not benefit from TBTF subsidies despite the assumption based on its value level, on which the user-fee is based, that SIFI would be exempt from paying. Thus, the user-fee proposal might makes sense even if there turns out not to be a TBTF subsidy despite such prior assumptions. In that case, presumably, there would simply be no fee to pay.

VI. CONCLUSION

Despite the Dodd-Frank Act's efforts to end the TBTF problem in 2010, several years after the act's passage the problem remains unsolved³⁷⁵ and no satisfactory plans to safely wind-down TBTF banks exist.³⁷⁶ Thus, many argue that the largest banks need to be reorganized in order to lessen

³⁷² See, e.g., *Sindell v. Abbott Laboratories*, 607 P.2d 924, at 936–37, (Cal. 1980); *Conley v. Boyle Drug Co.*, 570 So. 2d 275, 286 (Fla. 1990) (developing market share theory, which allows damaged plaintiffs that cannot determine which particular defendant caused their damage, to sue defendants collectively using a market-share analysis.).

³⁷³ *Id.*

³⁷⁴ *Conley*, 570 So. 2d at 282. Especially, as SIFIs' failures are not borne just by the risk-taking SIFIs, but impact many others.

³⁷⁵ According to Senator Elizabeth Warren, "the bigger these banks get the harder it is for the U.S. government to declare with any credibility that they will not bail them out if they get into trouble." Evan Weinberger, *GAO Says Wall Street Had No Undue Influence On Bank Study*, LAW360 (Jan. 08, 2014), available at <http://www.law360.com/securities/articles/499394/gao-says-wall-street-had-no-undue-influence-on-bank-study>.

³⁷⁶ See, e.g., Skeel, *supra* note 316.

the amount of risk that they pose to the financial system.³⁷⁷ Indeed, many commentators doubt that the biggest banks will ever be able to come up with satisfactory resolution plans, as it is not clear if living wills can actually help prevent financial crises.³⁷⁸ Alternatively, experts advocate for changing the bankruptcy code to make it easier to resolve large institutions,³⁷⁹ although reforms are not likely to happen in the near future.³⁸⁰

Following the unflattering media spotlight and reports on TBTF banks' subsidies, several banks have commissioned their own studies, arguing that they do not receive any subsidies.³⁸¹ Nevertheless, after reviewing the relevant available literature, FDIC Vice Chairman, Thomas Hoenig testified before the House Financial Services Committee that while "the estimated size of the subsidy may vary in degree, depending on the methodology, nearly all independent studies calculate the value to be in the billions of dollars."³⁸²

My focus in this article has been on showing that there is a TBTF subsidy, explaining the perverse effects that result from the subsidy, and examining the solutions that have been suggested to deal with these effects. I also suggest a new user-fee model that could be used with other approaches, and that makes sense even if there was no TBTF subsidy, because the fee would vanish if the subsidy is later found to be illusory. The conclusion I derive from my analysis is that the TBTF problem is not just an academic puzzle to be solved, but a complex, continuing political-economic situation. And while some of the best economic minds in the world are trying to figure out how to deal with this, unfortunately, there is no quick fix, nor a consensus on how to best tackle this problem. A main aspect of the difficulty

³⁷⁷ Jesse Hamilton & Craig Torres, *Biggest Banks' Wind-Down Plans Seen Failing to Cut Risks*, BLOOMBERG.COM, (June 26, 2013, 12:01 AM), available at <http://www.bloomberg.com/news/2013-06-26/biggest-banks-wind-down-plans-seen-failing-to-cut-risks.html> ("It is by now well known that the 2010 Dodd-Frank financial reforms did little to diminish the too-big-to-fail status of America's largest banks.").

³⁷⁸ *Id.*

³⁷⁹ This includes a Hoover Institution proposal for a new Chapter 14, which consists of a handful of amendments to the Bankruptcy Code that would make it more effective as a mechanism for handling the default of a large financial institution. See *Bankruptcy Not Bailout: A Special Chapter 14* (Kenneth E. Scott & John B. Taylor, eds., 2012). It also includes the Bipartisan Policy Center that suggested the bankruptcy code must change to give banks more flexibility to detach themselves from financial entanglements. See John Bovenzi et al., *Too Big to Fail: The Path to a Solution*, the Bipartisan Policy Center, BIPARTISANPOLICY.ORG (May 14, 2013), available at <http://bipartisanpolicy.org/library/report/too-big-fail-path-solution>.

³⁸⁰ Simon Johnson, *The Bankruptcy Exemption*, N.Y. TIMES (Nov. 7, 2013, 12:01 AM), available at http://economix.blogs.nytimes.com/2013/11/07/the-bankruptcy-exemption/?_r=1.

³⁸¹ See, e.g., STOGIN, *supra* note 13; Policy Brief, *supra* note 13.

³⁸² See *Examining How the Dodd-Frank Act Could Result in More Taxpayer-Funded Bailouts: Hearing Before H. Comm. On Fin. Servs.*, 113th Cong. 9 (2013) (statement of Thomas M. Hoenig, Vice Chairman, FDIC), available at <http://www.gpo.gov/fdsys/pkg/CHRG-113hhrg81769/pdf/CHRG-113hhrg81769.pdf>.

results from the fact that it is very difficult to calculate the total amount of the implicit and explicit TBTF subsidies and understand their perverse effects. Those interested in finding and challenging different subsidies are at an informational disadvantage, which is multiplied given the convolutedness of the subsidies themselves. As described in this article, data is widely fragmented and many of the value transfer means are not easy to quantify, especially in the tax subsidy area. This secrecy makes criticism by outside experts nearly impossible.

A different aspect of the TBTF problem is that following the crisis some of the leading U.S. banks have become even bigger and more complex. And while evidence implies that financial institutions can grow too-big-to-manage, as it is doubtful that true efficiency is attained by banks being valued at more than \$100 billion,³⁸³ there is disagreement on whether providing massive subsidies to such banks is helpful in preventing systemic risk. The living wills solution is not likely to be effective either, for various reasons,³⁸⁴ and will not prevent future bailouts, or modify the fashion in which regulators will deal with future crises.³⁸⁵ Indeed, following the first few rounds of submissions of the largest banks' living wills, commentators and regulators have admitted that the plans are falling far short of what is required.³⁸⁶ These failures result in increasing calls for breaking-up the biggest banks to reduce the risk of future crises, and as the most effective way to deal with the problem,³⁸⁷ especially following some of the recent big banks' scandals.³⁸⁸ Since break-ups are problematic and unrealistic,³⁸⁹ I believe that the practical user-fee model in combination with one or more approaches, can better address the problem. And while adopting the user-fee approach will only have a limited effect on the existence of the implicit

³⁸³ See Anat Admati, *Featured Guest, Debate: Big Banks: Should Big Banks be Broken Up?*, ECONOMIST.COM, May 14, 2013), available at <http://www.economist.com/debate/days/view/977>; Alan Greenspan, *The Crisis* 231 (Brookings Papers on Economic Activity, Spring 2010), available at http://www.brookings.edu/~media/Files/Programs/ES/BPEA/2010_spring_bpea_papers/2010a_bpea_gr_eenspan.pdf ("Federal Reserve research had been unable to find economies of scale in banking beyond a modest-sized institution.").

³⁸⁴ See generally Packin, *supra* note 10.

³⁸⁵ See David Skeel, *Magical Thinking at the FDIC*, LESS THAN THE LEAST (Apr. 20, 2011, 11:08AM), <http://www.law.upenn.edu/blogs/dskeel/>.

³⁸⁶ Alan Pyke, *Megabanks Are Unable To Prove They Aren't Too Big To Fail*, THINK PROGRESS, (June 26, 2013, 1:15 PM), available at <http://thinkprogress.org/economy/2013/06/26/2219551/megabanks-are-unable-to-prove-they-arent-too-big-to-fail/?mobile=nc>.

³⁸⁷ See *supra* note 316.

³⁸⁸ See e.g., Jesse Colombo, *This New Libor 'Scandal' Will Cause A Terrifying Financial Crisis*, FORBES (June 3, 2014), <http://www.forbes.com/sites/jessecolombo/2014/06/03/this-new-libor-scandal-will-cause-a-terrifying-financial-crisis/>.

³⁸⁹ Paul Krugman, *Too Big to Fail FAIL*, N.Y. TIMES, (June 8, 2009, 9:10 PM), available at <http://krugman.blogs.nytimes.com/2009/06/18/too-big-to-fail-fail/> ("I think of the pursuit of a world in which everyone is small enough to fail as the pursuit of a golden age that never was. Regulate and supervise, then rescue if necessary; there's no way to make this automatic.").

TBTF subsidies and not solve the TBTF issue, its main forte lies in its ability to reduce the probability of distress, enhancing regulatory supervision of SIFIs, as well as transparency, and contributing, even if partially, to a resolution fund.