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**Regulatory Competition in Global Financial Markets –
the Case for a Special Resolution Regime**

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Regulatory Competition in Global Financial Markets – the Case for a Special Resolution Regime

*Wolf-Georg Ringe**

DRAFT, January 15, 2016.

Regulatory arbitrage in financial markets refers to a number of strategies that market participants use to avoid the reach of regulation, in particular by virtue of shifting trading abroad or else relocating activities or operations of financial institutions to other jurisdictions. Where this happens, such arbitrage can trigger regulatory competition between jurisdictions that may respond to the relocation of financial services (or threats to relocate) by moderating their regulatory standards.

This paper develops a framework for the assessment of both phenomena in the context of financial regulation and assesses their merits. I argue that regulatory competition has many advantages over alternative global approaches, notably international harmonization of regulation, by offering a dynamic process for the discovery of efficient regulatory standards. However, the risk is that countries lower their standards solely to attract businesses and thereby impose externalities on the worldwide financial market by undermining financial stability as a global public good.

Policymakers worldwide are experimenting with remedies to respond to the phenomenon. I introduce the importance of an effective special resolution regime for financial institutions to the discussion. I argue that, within limits, a credible, worldwide resolution scheme can effectively contribute to reducing the dilemma. Its main benefit would be to tackle the problem of financial stability caused by systemically important financial institutions' excessive risk-taking. If such risk-taking would be judged by market discipline instead of posing a risk to global financial stability, the main downside of regulatory competition could be restrained. Within the boundaries of such a system, competition could then operate and contribute to a market-led design of financial regulation.

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I. INTRODUCTION

Strategies to avoid regulation are as old as regulation itself. But avoiding regulation by way of relocating to escape from the territorial reach of a regulator is a more recent strategy, which has gained in importance in an ever more globalized world. In the context of financial regulation, the phenomenon has gained new interest since the global financial crisis of 2007-09, partly because regulatory standards have been tightened in many jurisdictions, and partly because the crisis demonstrated dramatically how integrated international financial markets have become and how modern technology and the global reach of large banking groups have reduced the costs to escape from the reach of legal rules by moving operations abroad.

For example, the New York Times reported in 2011 under the heading “Could Barclays Move to New York?” that “Executives of large British banks, including HSBC, Standard Chartered and Barclays, had been threatening to move their headquarters abroad ever since a government-appointed banking commission [in the U.K.] hinted it would consider splitting investment and retail banking to make Britain’s financial sector more stable.”¹ According to this story, market analysts had taken the view that there is “little option for Barclays but to reconsider domicile.”² Such warnings are widely seen as a tactic by banks to scare their governments into abandoning plans for stricter financial regulation. Arguably, it is the shareholders, pushing for higher returns, who pressure Barclays to consider such a move.³ A relocation to Hong Kong is repeatedly being discussed at competitor HSBC, with reference to the increased U.K. bank levy and onerous regulatory reforms.^{4 5}

For the most part, such relocation scenarios remain nothing more than an empty threat.⁶ There is, however, a more refined, indirect way of moving banking business abroad: by shifting financial transactions to other entities within the same banking group. For example, in the reports about HSBC’s most recent plans, observers explain that the more likely option is to move the bank’s repo trading abroad. As Anthony Browne, chief executive of the British Bankers’ Association, argued, repurchase transactions can inflate banks’ balance sheet, which is unfortunate

¹ Julia Werdigier, *Could Barclays Move to New York?*, N.Y. TIMES DEALBOOK, March 30, 2011, available at <http://dealbook.nytimes.com/2011/03/30/could-barclays-move-to-new-york/?_r=0>. The quote refers to U.K. plans to mandate an organizational separation of different banking activities, based on recommendations by the Independent Commission on Banking (ICB, chaired by Sir John Vickers), which produced its final report in September 2011.

² Werdigier, *ibid.*

³ *ibid.*

⁴ HSBC, originally founded in Hong Kong, has reviewed the location of its headquarters every few years since 1992. The most recent round was launched in 2015 and suggested relocation back to Hong Kong: The bank cited the high U.K. bank levy and its strict new regulation that was introduced over the past few years as undermining the rationale for staying in London. Martin Arnold, David Oakley & Jennifer Hughes, *HSBC threatens to move headquarters from UK*, FIN. TIMES, April 25, 2015. Already in 2011, HSBC had concrete plans around 2011 to quit London for Hong Kong: “HSBC explained to shareholders that the more relaxed capital requirements in Hong Kong would cost less and generate more profit by allowing it to make greater use of its balance sheet.” Louise Armitstead, *HSBC plots London exit*, THE SUNDAY TELEGRAPH, March 6, 2011, at p. 1. The 2011 decision round was particularly controversial due to the release of the ICB report on bank ring-fencing (*supra* note 1): see Richard Wachman, *HSBC ‘must be sorely tempted’ to make Hong Kong its HQ*, THE GUARDIAN, September 13, 2011.

⁵ According to neutral observers, HSBC’s plans are more credible than Barclay’s, since HSBC’s structure means that they have already sufficient operations abroad; they are therefore in a position to threaten with a realistic exit option if government intervention becomes too constraining. Cornelia Woll, *THE POWER OF INACTION: BANKS BAILOUTS IN COMPARISON* 172 (Ithaca, NY: Cornell University Press, 2014); see also Pepper D. Culpepper & Raphael Reinke, *Structural Power and Bank Bailouts in the United Kingdom and the United States*, 42 POLITICS & SOCIETY 427, 437 ff. (2014).

⁶ Note that HSBC is reviewing the location of its headquarters every few years – they have repeatedly threatened to relocate abroad, but never done so.

for the bank's exposure to the U.K. bank levy.⁷ Instead, such transactions that have formerly been booked in London are now being moved abroad and executed by foreign subsidiaries.⁸ That would be an easier and more elegant way of avoiding the U.K. bank levy.

Another example for a more sophisticated arbitrage strategy concerns the U.S. rules on derivatives trading. When U.S. regulators recently toughened these rules, American banking groups were quick to respond by changing their trading behavior to avoid them. According to the Wall Street Journal and other media reports, "U.S. banks [...] are shifting some trading operations overseas to avoid tough CFTC rules."⁹ Again, this illustrates that banks do not have to physically move any assets or places of business abroad, but rather structure their trading operations in a way that escapes from the reach of domestic regulation. Subsidiaries or affiliates abroad then execute these trades instead of the corporate parent.

The question is whether all of these scenarios described are of importance to policy makers. In other words: are regulators impressed by the global relocation market, or, as the case may be, by a threat to relocate? From a moral point of view, they certainly should not. After a global financial crisis that came close to a financial meltdown, lawmakers worldwide have understood that they need to overhaul regulatory standards. As the Financial Times put it, "After a crisis in which the taxpayer bailed out the banks to the tune of many billions, the authorities cannot allow financial regulation to be guided by considerations of trade promotion. The public interest, not private profit, is what the rules should protect."¹⁰ But the comment goes on, revealingly, to observe that "[i]t is true that the UK proposals¹¹ are more stringent than those elsewhere. The most mobile parts of banking might look for more forgiving regimes."¹² These two statements nicely encapsulate the dilemma that regulators are faced with. They simply cannot ignore that they do not operate in a vacuum—but that they make choices in a world where competition lures elsewhere. So the reality is that they *do* care.¹³

⁷ The U.K. bank levy is a post-crisis annual tax on U.K. banks, charged depending on the size of the balance sheet. When the bank levy was introduced in 2011, the rate was set at 0.05%. Since then, the rate has been increased many times, up to 0.21% as of April 2015.

⁸ Patrick Jenkins, *Banks plot repo retreat from London*, FIN. TIMES, May 6, 2015, at p. 19.

⁹ Andrew Ackerman & Scott Patterson, *CFTC to Examine Swaps Loophole*, WALL ST. J., Sept. 6, 2014, at p. B1. See on this in more detail below III.A.

¹⁰ Financial Times, Comment, *Hold Britain's banks to higher standards: New rules on personal accountability are tough but necessary*, FIN. TIMES, October 9, 2014, at p. 12.

¹¹ Here: on personal accountability of senior bankers. See *infra* section IV.D.

¹² Financial Times, *supra* note 10.

¹³ See also the description made by *The Economist*, "A chance of showers", July 18, 2015, at p. 55: "Though bits of the regulatory set-up are stern, the British government has recently sent some conciliatory signals. It has tried to mollify big multinational lenders based in London with changes to the bank levy, an expensive and ill-conceived tax on their global balance-sheets. It will be halved, and

Consider politicians' seemingly benign arguments during the rulemaking process on various recent financial laws. During the European discussion around the strengthening of banks' capital requirements, "(...) the EU's internal market commissioner, Michel Barnier, stepped into the debate by warning of the potential downside from adopting rigid rules based on Basel III. Barnier fears European banks could become uncompetitive if they are forced to adopt higher capital rules than rival banks in the US or Asia."¹⁴ Further, the dramatic fight for capping bankers' bonuses in the EU has led many British policy makers to protest.¹⁵ The reason is obvious: "British officials and bankers have warned that the limits [on bonus payments] could make it harder to keep London, Europe's main financial hub, competitive with financial centers like New York, Singapore and Hong Kong."¹⁶

What counts here is the *perception* by policy makers, and the *alleged* threat of business exodus. At the moment of policy making, they can only make assumptions on whether the arbitrage threats are genuine or not, and on whether the perceived loss in competitiveness later really materializes. Just recently, a year after the EU bonus cap for financial executives came into force, commentators observed that "[s]o far, at least, new European restrictions on bonuses have not undermined London dramatically, with no wholesale shift of financial services jobs away from the UK, either to New York, or Asia."¹⁷ But—psychology matters. There is anecdotal evidence that the impact of the new bonus rules and other regulatory pressures have yet to feed through fully. 90 per cent of senior staff in the U.K. financial sector say that they are considering or willing to move abroad.¹⁸

To be sure: the list of examples provided here could be continued indefinitely. What this introduction seeks to describe has now become clear: the dialogue between regulators and regulatees does impact on the way financial rules are written.¹⁹ Financial institutions seek to avoid them: we speak of "regulatory arbitrage". Policy

applied only to local operations. The unspoken aim is to stop HSBC and Standard Chartered from moving to Asia, as they have threatened."

¹⁴ Phillip Inman, *UBS may move investment bank to UK to avoid Swiss capital regime*, THE GUARDIAN, May 26, 2011, available at <<http://www.theguardian.com/business/2011/may/26/ubs-may-move-investment-bank-to-uk-to-avoid-swiss-capital-regime>>.

¹⁵ The "Capital Requirements Directive IV" (CRD IV) implemented the Basel III capital standards in the E.U. and also introduced a cap on bankers' bonuses. DIRECTIVE 2013/36/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 26 June 2013 on access to the activity of credit institutions and the prudential supervision of credit institutions and investment firms, amending Directive 2002/87/EC and repealing Directives 2006/48/EC and 2006/49/EC, [2013] OJ L176/338.

¹⁶ James Kanter, *Europe's Finance Chiefs Reject British Move to Ease Caps on Bank Bonuses*, N.Y. TIMES, March 5, 2013, available at <<http://www.nytimes.com/2013/03/06/business/global/britain-isolated-as-european-colleagues-support-bonus-caps.html>>.

¹⁷ Michael Pooler, *New York and London vie for crown of world's top financial centre*, FIN. TIMES, October 2, 2014.

¹⁸ *ibid.*

¹⁹ See Harvey L. Pitt, *Bringing Financial Services Regulation into the Twenty-First Century*, 25 YALE J. REG. 315, 320 (2008).

makers bow to (perceived) market pressure and change their rules: that is “regulatory competition”. Business can easily shift to jurisdictions where the legal and regulatory environment is more attractive. And in an ever more globalized world, regulators find themselves among an increasing number of rivals.²⁰

This paper evaluates the power of market pressure on the way financial regulation is made. I will argue that—unlike in many other regulatory contexts—the phenomena of arbitrage and competition in financial rulemaking are potentially more problematic than elsewhere. This is linked to the ease of arbitrage on the one hand, and to the risks of deregulation for global financial stability of the other. This paper demonstrates that regulatory competition in financial markets is a reality, and it evaluates its merits. As a response to market behavior, it has many positive effects for the lawmaking process, but may at the same time pose a risk for and undermine global financial stability as a public good. The resulting dynamics may require regulatory intervention: the traditional response has been to promote international harmonization of legal rules, with extraterritorial reach as a comparable unilateral response. In contrast to these traditional concepts, this paper introduces the benefits that a special resolution regime for financial institutions can bring to the debate. I argue that resolution regimes can help introduce market discipline, and that threats to market stability can be eliminated where an effective and credible global framework is in place.

The paper is structured as follows. Section II gives an introduction to the notions of regulatory arbitrage and regulatory competition, and provides an analytical framework to analyze the subject matter of this paper. Section III then takes the debate into the specific field of financial markets regulation and identifies the problems that it creates in this context. This allows section IV to discuss the various regulatory answers that regulators traditionally subscribe to. Section V then introduces the benefits that a resolution regime for financial institutions can produce if it is designed in the right way. Section VI concludes.

II. REGULATORY COMPETITION AND ARBITRAGE: A PRIMER

At the center of this paper are the notions of regulatory arbitrage and regulatory competition. This section reviews the theoretical underpinnings to these concepts and provides an analytical framework for subsequent sections. This will

²⁰ Traditionally, the competition for the leading financial center in the world was mainly between New York and London. More recently, both cities have reason to be wary of their Asian rivals. See Pooler, *supra* note 17.

allow us to apply the theoretical framework specifically to financial markets regulation in section III.

A. Regulatory competition and arbitrage

“Regulatory competition” is the competition between lawmakers, or between regulators. It is commonly accepted to require three elements.²¹

First, for regulatory competition to work effectively, the regulatees – usually firms, but also individuals or executives – must be able to exploit legal differences between jurisdictions. This is a *legal* criterion: are firms allowed to select a different legal regime than the one that would otherwise apply? Is it legally possible to choose a different legal regime? For example, lawmakers may impose obstacles to such moves—in particular, they may obstruct their firms to relocate abroad or shift operations into other jurisdictions.²² In such cases, the possibility to engage in arbitrage does not even arise in the first place.

Secondly, once it is legally feasible, the more factual question is – do firms make use of these disparities? In other words: do firms actually engage in *arbitrage*? This is an empirical question, and investigates the “demand side” of legal rules. It is obvious that the answer will depend on the incentives that are at stake. If the legal differences between legal systems A and B are considerable, and the selection of system B promises substantial benefits to a firm that is subject to jurisdiction A, it will consider to engage in arbitrage between the two—provided, crucially, that the costs of switching are not too high.

Thirdly, firms engaging in regulatory arbitrage may then trigger the “supply side” of *regulatory competition*. That is, states may respond to arbitrage by enacting legal reforms and thus compete to attract firms or seek to win them back. Legal reforms that respond to the occurrence of arbitrage between legal systems are then designed to improve the own legal system at the expense of the other. Jurisdictions may thus copy rules that other jurisdictions have been successful with, or they may introduce new ones. Sometimes, they may respond to lobbying efforts by those firms that draw their attention to the superiority of alternative rules. But more frequently,

²¹ There is a rich theoretical literature on regulatory competition. See, *inter alia*, Charles M. Tiebout, *A Pure Theory of Local Expenditures*, 64 J. POL. ECON. 416 (1956); Wallace E. Oates & Robert M. Schwab, *Economic Competition Among Jurisdictions: Efficiency Enhancing or Distortion Inducing?*, 35 J. PUB. ECON. 333 (1988); Robert P. Inman & Daniel L. Rubinfeld, *The Political Economy of Federalism*, in PERSPECTIVES ON PUBLIC CHOICE: A HANDBOOK 73 (Dennis C. Mueller, ed., 1997); Daniel C. Esty & Damien Gérardin, REGULATORY COMPETITION AND ECONOMIC INTEGRATION – COMPARATIVE PERSPECTIVES (2001).

²² The “real seat theory” in corporate law was arguably an example of a legal doctrine which made it impossible for firms to move out of a jurisdiction to benefit from a different corporate legal system. See Wolf-Georg Ringe, *Corporate Mobility in the European Union – a Flash in the Pan? An empirical study on the success of lawmaking and regulatory competition*, 10 EUR. COMPANY & FIN. L. REV. 230, 235 (2013).

the sheer market pressure that arbitrage brings about will be sufficient to force lawmakers into action, provided – again – the incentives induce them to act.

Regulatory competition may be offensive or defensive. *Offensive* means that a state introduces legal reforms with the goal of attracting business: regulatory competition would be deliberately initiated in order to provoke arbitrage, thus effectively reversing elements two and three above. Introducing a low tax rate with the express objective of attracting firms may be an example. By way of contrast, *defensive* regulatory competition is the more common form of competition, where regulation reacts to the occurrence of arbitrage. If other countries respond and lower their tax rates to the same level (or lower), they would react to market forces and seek to gain business back.

B. Examples

Consider the development of regulatory competition in corporate law. As is well known, the competition for corporate charters in the U.S. is considered as the classical example for this development.²³

In the U.S., a firm can incorporate in any state regardless of where they are headquartered and have its “internal affairs” governed by the laws of its state of incorporation. An existing firm can also change their state of incorporation with the approval of the board and its shareholders without triggering major consequences other than the change in governing law. Technically, the latter step is usually achieved by merging a firm with a wholly owned subsidiary in the state of destination.²⁴ As a result, firms have a choice among legal regimes as long as states offer different legal rules.²⁵

²³ See, e.g., Lucian Arye Bebchuk & Allen Ferrell, *Federalism and Takeover Law: The Race to Protect Managers from Takeovers*, 99 COLUM. L. REV. 1168 (1999); Michael Klausner, *Corporations, Corporate Law, and Networks of Contracts*, 81 VA. L. REV. 757 (1995); Lucian Arye Bebchuk, *Federalism and the Corporation: The Desirable Limits on State Competition in Corporate Law*, 105 HARV. L. REV. 1435, 1461-70 (1992); Frank H. Easterbrook & Daniel R. Fischel, *THE ECONOMIC STRUCTURE OF CORPORATE LAW* (1991); Melvin A. Eisenberg, *The Structure of Corporation Law*, 89 COLUM. L. REV. 1461, 1512-13 (1989); Roberta Romano, *Law as a Product: Some Pieces of the Incorporation Puzzle*, 1 J. L. ECON. & ORG. 225 (1985); Daniel R. Fischel, *The “Race to the Bottom” Revisited: Reflections on Recent Developments in Delaware’s Corporation Law*, 76 NW. U. L. REV. 913 (1982); Ralph K. Winter, Jr., *State Law, Shareholder Protection, and the Theory of the Corporation*, 6 J. LEGAL STUD. 251, 256 (1977); William L. Cary, *Federalism and Corporate Law: Reflections upon Delaware*, 83 YALE L.J. 663, 666 (1974).

²⁴ See e.g. Ronald J. Gilson, ‘Globalizing Corporate Governance: Convergence of Form or Function’ 49 AMERICAN JOURNAL OF COMPARATIVE LAW 329, 355 n. 90 (2001). Delaware allows corporations and LLCs from other states to convert into a Delaware corporation pursuant to Delaware General Corporation Law § 265.

²⁵ See in detail Jesse H. Choper, John C. Coffee, Jr. & Ronald J. Gilson, *CASES AND MATERIALS ON CORPORATIONS* (8th ed., 2013) 229-235.

This situation has led to the much-discussed competition for corporate charters between U.S. states.²⁶ Delaware emerged as the leading venue for incorporations as early as the end of the 19th century, and it has stayed the on top of the league ever since. Firms are attracted by the flexibility of the legal system, and there is a long-standing scholarly debate on whether Delaware corporate law is particularly attractive to corporate managers. Other factors are the sophisticated Delaware court system and the well-established and service-minded Delaware registration system. Indeed, a large share of the annual revenue of Delaware relies on so-called franchise taxes, a fee that companies have to pay just for being registered there. In recent years, some developments in the European Union have emerged that could potentially trigger a competition between E.U. Member States resembling the Delaware phenomenon.²⁷

To be sure, regulatory competition is not exclusive to corporate law. Apart from this context, the phenomenon has been observed in many other contexts, including insolvency law,²⁸ securities regulation,²⁹ contract law,³⁰ environmental law,³¹ and taxation law,³² to name but a few.³³ Basically, it can exist wherever private actors have the possibility to choose: their choice allows them to compare legal systems, and the exercise of their choice helps create a marketplace for legal rules. An apt description speaks of “law as a product”.³⁴ Nevertheless, it has been recognized

²⁶ See the references cited *supra* at note 23.

²⁷ Luca Enriques, *EC Company Law and the Fears of a European Delaware*, 15 *Eur. Bus. L. Rev.* 1259 (2004); Eddy Wymeersch, *Centros: A Landmark Decision in European Company Law*, in *CORPORATIONS, CAPITAL MARKETS AND BUSINESS IN THE LAW: LIBER AMICORUM RICHARD M BUXBAUM* 629 (Theodor Baums, Klaus J. Hopt & Norbert Horn, eds., 2000); Francesco Munari & Paolo Terrile, *The Centros Case and the Rise of an EC Market for Corporate Law*, in *CAPITAL MARKETS IN THE AGE OF THE EURO: CROSS-BORDER TRANSACTIONS, LISTED COMPANIES AND REGULATION* 529 (Guido Ferrarini, Klaus J. Hopt & Eddy Wymeersch, eds., 2002); Wolf-Georg Ringe, *Corporate Mobility in the European Union – a Flash in the Pan? An empirical study on the success of lawmaking and regulatory competition*, 10 *EUR. COMPANY & FIN. L. REV.* 230 (2013).

²⁸ Robert K. Rasmussen & Randall S. Thomas, *Timing Matters: Promoting Forum Shopping by Insolvent Corporations*, 94 *NW. U. L. REV.* 1357 (2000); Wolf-Georg Ringe, *Forum Shopping under the EU Insolvency Regulation*, 9 *EUR. BUS. ORG. L. REV.* 579 (2008).

²⁹ Roberta Romano, *Empowering Investors: A Market Approach to Securities Regulation*, 107 *YALE L. J.* 2359 (1998); Roberta Romano, *The Need for Competition in International Securities Regulation*, 2 *THEORETICAL INQUIRIES IN LAW* 387 (2001).

³⁰ Stefan Vogenauer, *Regulatory Competition through Choice of Contract Law and Choice of Forum in Europe: Theory and Evidence*, 21 *EUR. REV. OF PRIVATE L.* 13 (2013); Giesela Rühl, *The Choice of Law Framework for Efficient Regulatory Competition in Contract Law*, in *REGULATORY COMPETITION IN CONTRACT LAW AND DISPUTE RESOLUTION* 287 (Horst Eidenmüller, ed., 2013).

³¹ David M. Konisky, *Regulatory competition and environmental enforcement: Is there a race to the bottom?*, 51 *AM. J. POL. SCI.* 853 (2007); Veerle Heyvaert, *Regulatory Competition—Accounting For the Transnational Dimension of Environmental Regulation*, 25 *J. ENVTL. L.* 1 (2013).

³² Wolfgang Schön, *Playing Different Games? Regulatory Competition in Tax and Company Law Compared*, 42 *COMMON MARKET L. REV.* 331 (2005).

³³ See, for other fields, *REGULATORY COMPETITION IN CONTRACT LAW AND DISPUTE RESOLUTION* (Horst Eidenmüller, ed., 2013).

³⁴ Roberta Romano, *Law as a Product: Some Pieces of the Incorporation Puzzle*, 1 *J. L. ECON. & ORG.* 225 (1985). Similarly, academics speak of a “law market”: Erin A. O’Hara & Larry E. Ribstein, *THE LAW MARKET* (2009).

that each of these different areas of law have specific features that warrant a separate discussion for each – and prohibit generalizable conclusions.³⁵

Furthermore, both regulatory arbitrage and regulatory competition may occur in different directions. The variant of competition described so far is a geographical or jurisdictional competition market, where private actors can select legal rules of a different jurisdiction, state or country. This type of regulatory competition has been most successful within federal legal structures that facilitate free choice, such as the U.S. or the E.U. (see above).³⁶

Arbitrage and competition may however also occur within one jurisdiction. Such “intra-jurisdictional” arbitrage is possible wherever actors are changing the factual basis of a transaction or activity in order to avoid or circumvent domestic regulation *within* one single jurisdiction.³⁷ Such substantive arbitrage or competition can be exemplified by the dramatic growth of the shadow banking sector.³⁸ Those actors on the financial markets have been actively set up or structured in a way that they escape the definition of a “bank” or a “financial institution”, as the case may be. Falling outside the scope of banking regulation may allow them to disregard regulation on capital requirements for example, and thus give them a comparative advantage. Related to this are situations where regulatees attempt to exploit the overlap or diverging scope of competing regulators. To illustrate, the American banking sector is known for the myriad of different regulators that oversee it or parts of it.³⁹ Likewise, the emerging landscape in Chinese regulatory oversight of financial services faces a number of different regulatory schemes affecting the same type of business.⁴⁰ A fragmented regulatory structure with a variety of norms and standards encourages financial institutions to shop for the weakest regulator. In a recent insightful account of such arbitrage, former FDIC chairman Sheila Bair described such regulatory shopping occurring between banks and nonbanks, with mortgage brokers and securities firms operating outside the stronger regulations imposed on

³⁵ See Daniel C. Esty & Damien Gérardin, *REGULATORY COMPETITION AND ECONOMIC INTEGRATION – COMPARATIVE PERSPECTIVES* (2001).

³⁶ Simon Deakin, *Legal Diversity and Regulatory Competition: Which Model for Europe?*, 12 *EUR. L. J.* 440 (2006). For a detailed analysis of regulatory competition in the E.U. context, see Barbara Gabor, *REGULATORY COMPETITION IN THE INTERNAL MARKET: COMPARING MODELS FOR CORPORATE LAW, SECURITIES LAW AND COMPETITION LAW* (2013).

³⁷ Frank Partnoy, *Multinational Regulatory Competition and Single-Stock Futures*, 21 *NW. J. INT’L L. & BUS.* 641, 644 (2001); Victor Fleischer, *Regulatory Arbitrage*, 89 *TEX. L. REV.* 227, 229 (2010). See also, using a different terminology, Annelise Riles, *Managing Regulatory Arbitrage: A Conflict of Laws Approach*, 47 *CORNELL INT’L. L. J.* 63, 71 f. (2014).

³⁸ The IMF recently emphasized the risk that shadow banking, as a form of regulatory arbitrage, can be for financial stability. See International Monetary Fund, *GLOBAL FINANCIAL STABILITY REPORT – RISK TAKING, LIQUIDITY, AND SHADOW BANKING: CURBING EXCESS WHILE PROMOTING GROWTH* (October 2014), at pp. 69, 74, 75.

³⁹ On the resulting complexity problems, see Jody Freeman and Jim Rossi, *Agency Coordination in Shared Regulatory Space*, 125 *HARV. L. REV.* 1131, 1148 (2012).

⁴⁰ Xusheng Yang, *Inside China: fragmented regulatory oversight to end?*, *INT’L. FIN. L. REV.* 4/2014, p. 54 (2014).

FDIC-insured banks.⁴¹ Another example of domestic or “intra-jurisdictional” arbitrage is the futurization of traditional OTC derivatives, which is intended to escape the tough new requirements on OTC derivatives under the Dodd-Frank-Act.⁴²

Finally, we may observe a specific type of regulatory competition, termed “vertical regulatory competition”, that may be present in federal legal structures that see a rivalry between lower and higher level of regulatory competence. The leading account to describe this is by Mark Roe, whose work discusses the rivalry between Delaware and the federal level of lawmaking, namely the SEC, in corporate lawmaking.⁴³ Roe’s key argument is that Delaware law is under the continued threat to be preempted by the federal lawmakers and therefore indirectly influenced by the SEC, thus ultimately mimics federal positions. More generally, competitive federalism describes the rivalry between two lawmaking levels, where both compete over influence and agenda-setting and attempt to eliminate or at least shape lawmaking on the other level. First movers, for example, may influence subsequent lawmaking on another level. Within the E.U., this may happen in a vertical direction (between Member States and the EU and vice versa) and/or on a horizontal level (between Member States, in the shadow of proposed E.U. activity). An example would be the rivalry between the U.K. Independent Commission on Banking (Vickers Commission) and its E.U. counterpart (Liikanen Group) on how to best address structural issues of the banking sector.⁴⁴

C. Normative considerations

The key question to be asked seeks to explore the normative angle of the process: are regulatory competition and arbitrage welfare-enhancing mechanisms, or are they destructive phenomena? In other words, does competitive pressure between lawmakers or regulators produce functional legal rules, or inefficient outcomes?⁴⁵

This is the famous debate between the “race to the bottom” versus “race to the top”. Sceptics of regulatory competition hold that competition is prone to yield inefficient outcomes, most notably benefitting only those constituencies who have the strongest influence on the process of selecting legal rules. This would impose corresponding externalities on other groups. For example, they claim in the context of

⁴¹ Sheila Bair, *BULL BY THE HORNS* 192 (2012).

⁴² Christian Johnson, *Regulatory Arbitrage, Extraterritorial Jurisdiction, and Dodd-Frank: The Implications of US Global OTC Derivative Regulation*, 14 *NEV. L.J.* 542, 608 ff. (2014). On Dodd-Frank and OTC derivatives, see *infra* sections IV.C and V.B.

⁴³ Mark J. Roe, *Delaware’s Competition*, 117 *HARV. L. REV.* 588, 591-592 (2003). More recently, Mark Roe, *Delaware and Washington as Corporate Lawmakers*, 34 *DEL. J. CORP. L.* 1 (2009); Mark Roe, *A Spatial Representation of Delaware-Washington Interaction in Corporate Lawmaking*, 2 *COLUM. BUS. L. REV.* 553 (2012).

⁴⁴ See on this *infra* section IV.D.

⁴⁵ As Oates & Schwab asked: “Efficiency Enhancing or Distortion Inducing?”, see *supra* note 21.

Delaware charter competition that the competition between U.S. states only serves corporate management—at the expense of other groups like shareholders or employees.⁴⁶ This argument rests on the fact that managers arguably de facto control the corporation’s decision on whether and where to relocate to another state. If this is so, firms (and managers) might only choose a different corporate law in order to expropriate those other stakeholders that are not part of the decision-making process or that they can outvote or influence. States would then compete to permit those expropriations.

Others scholars assert the opposite: that competition leads to the most efficient legal rules. According to this view, regulatory competition supports a “discovery procedure” for the best design of laws. The assumption here would be that firms adopt their legal rules in order to reduce their costs of production and to facilitate their operations.⁴⁷ States would then compete to design efficient laws; consequently, the most advantageous and successful legal rule will emerge as the winner from the competitive battle.

The simple dichotomy between “top” and “bottom” is of course not providing a full account of the more complicated reality. Delaware aside, regulatory competition is for example unlikely to provide a single winner. Rather, we should expect a specialization of states, offering a specific “law product” for a distinct purpose.⁴⁸ To illustrate, whereas Delaware might be the leading incorporation state for public companies, other states might offer a corporate form that is more sophisticated for close corporations or family-owned firms. A legal structure that allows optimal support from venture capital firms might be another example. By offering these specialized products, states could seek to gain a comparative advantage in a niche market. Another more realistic outcome is that we will not see an “end point” in the competitive race, but rather an ongoing process where states can continuously be challenged. For example, Delaware came under severe pressure during the 1980s takeover wave, and fought hard to retain its leading position. States may either copy Delaware law, or they may design their own, experimenting with rules that might be accepted by the market better than the established rules. This, in turn, might trigger a mutual learning process that will be continuously ongoing.

In an attempt to synthesize both “views of the cathedral”, it is the main objective of all regulatory endeavors in this field to preserve the creative, dynamic side of regulatory competition whilst eliminating the likely externalities that may be imposed on third parties.⁴⁹ Key for any regulatory framework is not so much the

⁴⁶ E.g. Bebchuk, *supra* note 23.

⁴⁷ See, for a seminal analysis, Roberta Romano, *THE GENIUS OF AMERICAN CORPORATE LAW* (1993).

⁴⁸ Consider the recent example of Nevada: Michal Barzuza & David C. Smith, *What Happens in Nevada? Self-Selecting into Lax Law*, 27 *REV. FIN. STUD.* 3593 (2014).

⁴⁹ See Ethiopis Tafara & Robert J. Peterson, *A Blueprint for Cross-Border Access to U.S. Investors: A New International Framework*, 48 *HARV. INT’L. L. J.* 31, 52 (2007).

outcome of regulatory competition, but rather the *process* under which arbitrage happens. Put simply: the lower the costs on third parties, the weaker the case for regulatory intervention. Consequently, the process of relocating needs to be regulated in a way that no group is negatively affected by the relocation decision without their consent, or without at least adequate protection of their interests in place. Thus, as we have seen in corporate law, the debate is all about whether the process of relocating to Delaware is controlled by management, to the detriment of shareholders. Accordingly, shareholder advocates ask for a different decision making process to strengthen shareholders who might be negatively affected by the move.⁵⁰ As I have argued elsewhere, the matter is similar for creditors in insolvency arbitrage: the risk of inefficiencies will be minimal where creditors are involved in the decision-making and support the move, or where at least adequate safeguards control for their expropriation.⁵¹ In sum, what matters is whether the legal framework provides for protection standards for those groups affected by arbitrage behavior that did not price in the risk.

Having framed the problem in this way, we can now move on to consider the specific constellation of regulatory arbitrage and competition in the context of financial markets regulation.

III. COMPETITION AND ARBITRAGE IN FINANCIAL MARKETS

A. A specific and different environment

The theoretical framework for regulatory competition developed so far must take into account the specific aspects of financial regulation when applied to that field. Unlike many other legal disciplines, financial markets regulation exhibits a number of particular features that make it distinct.

First, consider the arbitrage opportunities available. Essentially, the provision of financial services is an intangible business that can easily be shifted between jurisdictions. Unlike the real economy, there are no factories and few other physical assets that are costly to move: money can cross borders easily.⁵² We saw already in the introduction that arbitrage is happening in a more sophisticated way, where trading moves abroad, not companies. Likewise, banks and other financial institutions can contact and deal with their customers from whichever country in the world they are formally operating from, thanks largely to modern telecommunication and IT. Consider the following example from the current regulatory context. There is

⁵⁰ Bebchuk, *supra* note 23.

⁵¹ Ringe, *supra* note 28, at p. 603 ff.

⁵² Christian Tietje & Matthias Lehmann, *The Role and Prospects of International Law in Financial Regulation and Supervision*, 13 J. INT'L. ECON. L. 663, 669 (2010).

evidence that some (U.S. and international) banks are shifting swap agreements overseas in order to avoid the new costly requirements for derivatives dealings imposed by the 2010 Dodd Frank Act.⁵³ The main regulator for derivatives, the Commodity Futures Trading Commission (CFTC) is alarmed by what it considers an “artificial avoidance” of their oversight.⁵⁴ What happens in reality? U.S. banks are “outsourcing” derivatives trading with very simple step: they give up the previous practice of guaranteeing swap contracts that their foreign subsidiaries enter into. In doing so, the deals do not fall within the scope of Dodd-Frank requirements to be traded on a public platform.⁵⁵ Instead, they will be subject to foreign – most typically, U.K. (or Japanese) – supervision. Similarly, a number of foreign banks are presently reconsidering whether they should trade their derivatives under the new U.S. framework, or whether they can avoid the costly requirements by keeping their deals elsewhere.⁵⁶ The irony of the situation lies in the fact that all G20 countries have pledged to a similar move and to remove opacity from the derivatives markets.⁵⁷ Since the corresponding legislation in Europe (MiFID II) will however not be in place before 2017, the move to London apparently makes sense for some banks in the interim period.⁵⁸

⁵³ On the international scope of application of these provisions, in particular driven by interpretative guidance from the CFTC, see Sean J. Griffith, *Substituted Compliance and Systemic Risk: How to Make a Global Market in Derivatives Regulation*, 98 Minn. L. Rev. 1291, 1330 ff. (2014).

⁵⁴ Andrew Ackerman & Scott Patterson, *CFTC to Examine Swaps Loophole*, WALL ST. J., Sept. 6, 2014, at p. B1. The CFTC is designing new regulation to close this possibility. See Douwe Miedema, *U.S. regulator plans to close swaps trading loophole*, REUTERS, June 9, 2015, available at <<http://www.reuters.com/article/2015/06/09/banking-rules-derivatives-idUSL1N0YV1H520150609>>; Douwe Miedema, *U.S. swaps regulator CFTC to close cross-border loophole*, REUTERS, June 29, 2015, available at <<http://www.reuters.com/article/2015/06/29/us-cftc-swaps-crossborder-idUSKCN0P92FS20150629>>.

⁵⁵ According to CFTC guidance, “where a non-U.S. affiliate of a U.S. person has its swap dealing obligations with non-U.S. counterparties guaranteed by a U.S. person, the guarantee creates a significant risk transfer into the United States.” See CFTC, *Interpretive Guidance and Policy Statement Regarding Compliance With Certain Swap Regulations*, 78 FED. REG. 45292, 45313 (July 26, 2013).

⁵⁶ See the references provided by Christian Johnson, *Regulatory Arbitrage, Extraterritorial Jurisdiction, and Dodd-Frank: The Implications of US Global OTC Derivative Regulation*, 14 NEV. L.J. 542, 604 (2014)

⁵⁷ G20, LEADERS’ STATEMENT – THE PITTSBURGH SUMMIT, September 24-25, 2009, available at <https://www.g20.org/sites/default/files/g20_resources/library/Pittsburgh_Declaration.pdf>: “All standardized OTC derivative contracts should be traded on exchanges or electronic trading platforms, where appropriate, and cleared through central counterparties by end-2012 at the latest. OTC derivative contracts should be reported to trade repositories. Non-centrally cleared contracts should be subject to higher capital requirements. We ask the FSB and its relevant members to assess regularly implementation and whether it is sufficient to improve transparency in the derivatives markets, mitigate systemic risk, and protect against market abuse.”

⁵⁸ DIRECTIVE 2014/65/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 15 MAY 2014 ON MARKETS IN FINANCIAL INSTRUMENTS and amending Directive 2002/92/EC and Directive 2011/61/EU, [2014] OJ L173/349 needs to be implemented by July 2016 and will apply from January 3, 2017. See Article 93. In some ways, the problem has been anticipated by Acharya et al., *supra* note 104, at p. 367. See also Phil Davis, *Managers face upheaval in OTC derivatives*, FIN. TIMES, March 5, 2012, p. FTfm 12.

This example illustrates an important point: arbitrage in financial markets does usually not happen in the “old-style”, physical way, as with cross-border mobility of corporations. Financial institutions typically do not relocate the firm itself (let alone physical assets, establishments or factories) to another jurisdiction, but they *simply execute trades through a foreign affiliate*. This will particularly be true for large financial groups that have subsidiaries in all major financial centers around the globe.

Secondly, incentives for arbitrage will be high. This is because differences in regulation are immediately visible in the profitability of a business. The financial sector deals with a product where tighter regulation immediately translates into lower profits. Firms therefore find it much easier to detect the impact the legal framework has on their business model. Moreover, global financial services deal with comparable products – no strong switching costs or demand problems threaten to make arbitrage unprofitable. Low transaction costs and transparency of products therefore fuel competitiveness in this market and encourage firms to exploit arbitrage opportunities to reduce their costs. What is more—designers of financial instruments have strong incentives to offer ever more complex products, suggesting that these “innovations” were required by original market demand.⁵⁹

Thirdly, on the supply side of legal rules, regulators everywhere are under particularly high pressure to take up the competition challenge presented by regulatory arbitrage. This is partly a reflection of the considerations we noted for the demand side above. Obviously, the higher arbitrage opportunities are, the stronger will be the pressure felt on the regulator. However, the additional specific characteristics of financial markets are that financial services are vital for each economy. Loosing banks that relocate or move trades to another jurisdiction is a scenario no government can afford, given the enormous importance that they play in the support of the real economy. Likewise, the prospect of attracting new financial institutions to one’s shores is a highly attractive move and understood as a political victory.⁶⁰ From a political economy perspective, much of financial regulation used to be adopted in the name of saturating the alleged growing market demand for financial products; recent scholarship has demonstrated, however, that regulation has been driven to a large extent by the *supply* of new products—which, in turn, was arguably driven by arbitrage considerations relating to previous regulatory standards.⁶¹ The

⁵⁹ Dan Awrey, *Toward a supply-side theory of financial innovation*, 41 J. COMP. ECON. 401 (2013).

⁶⁰ When HSBC reviewed its headquarter location in 2015, the Hong Kong Monetary Authority welcomed the process and stated that it would take “a positive attitude should HSBC consider relocating its headquarters back to Hong Kong.” HSBC’s share price jumped more than 3.4 per cent on the announcement. See Martin Arnold, David Oakley & Jennifer Hughes, *HSBC threatens to move headquarters from UK*, FIN. TIMES, April 25, 2015.

⁶¹ Awrey, *supra* note 59. See also, from a broader perspective, Katharina Pistor, *A legal theory of finance*, 41 J. COMP. ECON. 315, 320, 324 (2013).

mobility of financial institutions has dramatically grown in recent years: a current study reports that the number of international bank mergers has climbed from 572 in 2000 to more than 2,000 in 2007.⁶² According to statistics from the Bank for International Settlements (BIS), banks' foreign claims worldwide increased from \$ 1.12 trillion in 1987 to \$ 32 trillion in 2014.⁶³ All of this has caused early commentators to state that '[c]apital, except possibly for corporate capital trapped by divided taxes, will be the big winner of systems competition'.⁶⁴

We noted above that arbitrage behavior may exert competitive pressure on regulators. To further complicate that claim, the financial market is characterized by many different types of "regulators", which may be sovereign but can also be private. Stock exchanges are an example of institutions that are organized as private companies but set specific standards for public companies to be listed. Over the past years, a dramatic competition between the world's largest stock exchanges has developed that seek to attract as many listings as possible.⁶⁵ For example, the deregulation precipitated by the U.S. JOBS Act has triggered attempts by stock exchanges to mimic this trend,⁶⁶ or the availability of "dark pool" trading is currently understood as a competitive feature for exchanges.⁶⁷ Sometimes, exchanges are surprisingly candid and outspoken about their objectives. When Alibaba in 2014 chose to list in New York instead of Hong Kong, due to the fact that Hong Kong's standards would not permit Alibaba's corporate governance arrangements, the Hong Kong Exchange initiated a review of its Listing Rules to allow the contentious dual-class shares and weighted voting rights.⁶⁸

Further, due to the complexities of the subject matter and the international reach of financial markets, a number of private bodies act de facto as rule makers: examples include the International Swaps and Derivatives Association, ISDA, or the

⁶² Hui Dong, Frank Song & Libin Tao, *Regulatory Arbitrage: Evidence from Bank Cross-border M&As*, Working Paper, 2011, fn. 2.

⁶³ See for up-to-date data, Bank for International Settlements, Consolidated banking statistics, available at <<http://www.bis.org/statistics/consstats.htm>>.

⁶⁴ Hans-Werner Sinn, *THE NEW SYSTEMS COMPETITION* 60 (2003).

⁶⁵ Estelle Cantillon & Pai-Ling Yin, *Competition between exchanges: A research agenda*, 29 INT'L J. OF INDUSTRIAL ORG. 329 (2011). As an example, German stock exchanges take pride in attracting many listing from China, see Heribert Hirte, *Chinesische Unternehmen drängen an Deutsche Börse*, RECHTSBOARD, July 8, 2011, available at

<<http://blog.handelsblatt.com/rechtsboard/2011/07/08/chinesische-unternehmen-drangen-an-deutsche-borse/>>; Christian Hiller von Gaertringen, *Chinesische Emittenten mögen die Deutsche Börse*, FRANKFURTER ALLGEMEINE ZEITUNG, August 7, 2010, available at <<http://www.faz.net/-01f20a>>.

⁶⁶ John Gapper, *Looser listing rules will not help start-ups win investors*, FIN. TIMES, September 27, 2012, at p. 15.

⁶⁷ Philip Stafford, *Deutsche Börse to offer hidden trading*, FIN. TIMES, November 30, 2015, at p. 18.

⁶⁸ Ashley Lee, *HK to consult further on dual class shares*, INT'L FIN. L. REV., July 6, 2015, at p. 1.

International Securities Lending Association, ISLA, both of which write many industry standards which have de facto become accepted as worldwide best practice.⁶⁹

In short: the financial sector differs fundamentally from most other markets.⁷⁰ All of the character of its activity, the ease of relocation, the absence of any worldwide institution formulating a regulatory framework, the multitude of regulators, and the financial risks involved make it a playing field that has strongly attracted both regulatory arbitrage and regulatory competition equally. Research has addressed these features early on, but has remained divided on their assessment. Beginning in the 1980s, regulatory arbitrage has either been welcomed as a correction to overregulation⁷¹ or criticized as a threat to effective market supervision.⁷² The debate has recently been reopened, as the financial crisis has shown the (perceived) need for further regulation—and thereby highlighted every growing loopholes and possibilities for regulatory arbitrage. Moreover, in an ever more globalized world, regulators must think carefully about how to handle arbitrage opportunities and deal with competitive pressure.

B. Recognized goals of Financial Regulation

In order to fully understand how regulatory competition interacts with financial regulation, we first need to gain clarity on the goals that financial regulation seeks to achieve.

Financial markets law serves a plurality of objectives. First and foremost, it aims at fostering the quality of securities markets as a supply of external funding for economic activity. The goal of improving market efficiency is rooted in the problem of price-sensitive information as a public good. Customers and intermediaries on the financial markets may not gather enough information because they have to share it with others. Likewise, firms may not disclose enough information because they do not want to reveal proprietary information to competitors. Regulatory invention thus seeks to ensure that sufficient information is available to market participants, without producing an “information overflow”,⁷³ and that the value of information is not distorted, for example, by manipulation.⁷⁴

⁶⁹ See, on ISDA for example, John Biggins & Colin Scott, *Public-Private Relations in a Transnational Private Regulatory Regime: ISDA, the State and OTC Derivatives Market Reform*, 13 EUR. BUS. ORG. L. REV. 309 (2012).

⁷⁰ Frank Partnoy, *Financial Derivatives and the Costs of Regulatory Arbitrage*, 22 J. CORP. L. 211, 254 f. (1997).

⁷¹ Merton H. Miller, *Financial Innovation: The Last Twenty Years and the Next*, 21 J. FIN. & QUANTITATIVE ANALYSIS 459 (1986)

⁷² See, e.g., Partnoy, *supra* note 70.

⁷³ On this problem, see the speech by SEC Commissioner Tory Paredes at Fordham Law School, New York, October 27, 2011: “Simply put, it is possible for there to be too much information for investors and others to work through constructively.”; Robert P. Bartlett, III, *Inefficiencies in the Information Thicket: A Case Study of Derivative Disclosures During the Financial Crisis*, 36 J. CORP. L. 1 (2010).

Secondly, financial regulation seeks to protect (retail) investors in using financial markets and dealing with providers of financial services.⁷⁵ Regulators worldwide agree that financial markets produce asymmetric information between sophisticated players and private retail investors. Recent research from behavioral science adds to that and stresses the biases that consumers have when making investment decisions. A large bulk of financial regulation thus regulates the “conduct of business”, aiming at the protection of arguably weaker parties.⁷⁶ Supervision of financial institutions is also based on this rationale.⁷⁷

Financial stability is a third and important goal.⁷⁸ Financial regulation is meant to preserve the stability of both markets and financial institutions. It is concerned with negative externalities associated with the behavior of financial intermediaries. To illustrate, individual firms do not take into account the costs their actions impose on others. What is more, the financial system is highly interconnected: the failure of one firm can affect the viability of others by way of contagion. This is, in short, the justification for “prudential” regulation, envisaging the financial system as a whole rather than individual contracts.

Finally, financial regulation strives to foster competition in the financial industry. As we know from competition theory, monopolistic practices create an overall market loss due to transactions that are not realized because of pricing policies.⁷⁹ Such a situation fails to exhaust the full potential that the market could offer. Accordingly, key regulatory instruments seek to encourage competition between its players, and some of them have listed competition explicitly as a goal.⁸⁰

See also Gillian Tett, *A guiding light is needed to cut through the fog of financial data*, FIN. TIMES, March 9, 2012, at p. 32.

⁷⁴ This is the justification for market manipulation rules.

⁷⁵ Steven Maijoor, ESMA Chair, *The ESAs role in financial consumer protection*, CNMV Conference – La Nueva Financiera Regulación, Madrid, October 15, 2014, ESMA/2014/1265, available at <http://www.esma.europa.eu/system/files/2014-1265_keynote_speech_the_esas_role_in_financial_consumer_protection_cnmv_conference_madrid_-_steven_maijoor.pdf>.

⁷⁶ See, for example, DIRECTIVE 2014/65/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 15 MAY 2014 on markets in financial instruments and amending Directive 2002/92/EC and Directive 2011/61/EU (“MiFID II”), [2014] OJ L173/349, recital (2): “...it is necessary to provide for the degree of harmonisation needed to offer investors a high level of protection”. The Dodd-Frank-Act already signals this goal in its full name: “An Act to promote the financial stability of the United States by improving accountability and transparency in the financial system, to end “too big to fail”, to protect the American taxpayer by ending bailouts, *to protect consumers from abusive financial services practices*, and for other purposes” (emphasis added).

⁷⁷ Directive 2006/48/EC (“Capital Requirements Directive”), recital (57): “Supervision of credit institutions on a consolidated basis aims at, in particular, protecting the interests of the depositors of credit institutions and at ensuring the stability of the financial system.”

⁷⁸ Viral Acharya & Matthew Richardson (eds.), *RESTORING FINANCIAL STABILITY: HOW TO REPAIR A FAILED SYSTEM* (2009); Group of Thirty, *FINANCIAL REFORM: A FRAMEWORK FOR FINANCIAL STABILITY* (2009), available at <<http://fic.wharton.upenn.edu/fic/Policy%20page/G30Report.pdf>>.

⁷⁹ The so-called “deadweight loss”.

⁸⁰ See, e.g., Directive 2004/39/EC (“MiFID I”), recital (34): “Fair competition requires that market participants and investors be able to compare the prices that trading venues ... are required to publish”;

Just recently, the Chief Executive of the UK Financial Conduct Authority (FCA), Martin Wheatley, emphasized the importance of competition in financial markets. He sees the regulator's role in helping to shape a market that "offers consumers alternatives, products that meet their needs, delivered in a way that fits with how they live".⁸¹

The last goal mentioned in this list is particularly revealing for the topic under consideration here, as it demonstrates that competition as such is an explicit objective of regulatory efforts. To be sure, regulators' intentions are targeting competition between the providers of financial services, and not between regulators themselves. But it demonstrates a broader point: that competition is usually seen as a positive thing in a capitalist system, improving consumer choice and thus general welfare. As we will see, competition can have negative implications for the overall stability of the financial market, and thus for another of the goals listed above. The four objectives are thus both correlated and are in a relationship of mutual tension.

C. The problem of regulatory competition in financial markets

Given the specific features and characteristics of financial markets, it is no surprise that many academics fear the threat of a race to the bottom.⁸²

i. Externalities in the regulation of financial markets

The key proposition advanced above is that the desirability of regulatory competition depends on the presence of negative and usually unforeseen externalities.⁸³ In the case of corporate law, we have seen that such externalities may appear in the form of negative consequences for intra-corporation stakeholders and other constituencies affected by the relocation of a corporation, where such costs have not been priced in *ab initio*. In financial markets, I would argue that externalities can occur on a much wider, broader scale and may be imposed on parties with a far more

MiFID II, recital (117): "it will be assured that competition will take place on the basis of quality of service to clients rather than breadth of data covered". See also the U.S. National Securities Market Improvement Act 1996: "Whenever ... the Commission is engaged in rulemaking and is required to consider or determine whether an action is necessary or appropriate in the public interest, the Commission shall also consider, in addition to the protection of investors, whether the action will promote efficiency, competition, and capital formation."

⁸¹ *Competition in the interests of consumers*, speech by Martin Wheatley, Chief Executive of the FCA, at Mansion House, London, October 17, 2014, available at <<http://www.fca.org.uk/news/competition-in-the-interests-of-consumers>>.

⁸² See Viral V. Acharya, Paul Wachtel & Ingo Walter, *International alignment of financial sector regulation*, in *RESTORING FINANCIAL STABILITY: HOW TO REPAIR A FAILED SYSTEM* 365, 370 (Viral V. Acharya & Matthew Richardson, eds., John Wiley & Sons, New Jersey 2009); James R. Barth, Gerard Caprio & Ross Levine, *RETHINKING BANK REGULATION: TILL ANGELS GOVERN* 68 (Cambridge University Press, Cambridge, 2006).

⁸³ See *supra* part II.C.

remote connection to the source of the externality: competition between rulemakers may affect *financial stability* of worldwide markets. The concept of financial stability has become a paramount regulatory objective, not least since the financial crisis.⁸⁴ In a nutshell, it is a condition where the financial system – intermediaries, markets and market infrastructures – can withstand shocks without major disruption in financial intermediation and in the effective allocation of savings to productive investment.⁸⁵ In the wake of the crisis, regulators worldwide have been created or have been devoted new resources to watching the market as a whole and monitoring financial stability through conducting prudent monetary policy, performing effective regulation of financial actors, and promoting robust market infrastructures.⁸⁶

Crucially important, financial stability is a global public good⁸⁷—that is, according to standard microeconomic theory, a good that is both non-rivalrous and non-excludable. From a regulatory perspective, public goods present an important market failure in that they invite “free rider” behavior, where people not paying for the good may continue to consume it. Thus, the good may be under-produced, overused or degraded. Consequently, one important feature of public goods is that they will usually not be provided sufficiently if left solely to the market.⁸⁸ Others have sought to come to the same conclusion with an analogy to the classic “tragedy of the commons”.⁸⁹

Consider an example that is important to the narrative of this paper. Individual financial centers that lure institutions or trading to their shores by offering laxer regulatory standards and greater latitude in financial engineering may have an understandable interest in doing so. After all, financial services are vital for each

⁸⁴ See *supra*, text to note 78.

⁸⁵ European Central Bank, FINANCIAL STABILITY REVIEW, <<https://www.ecb.europa.eu/pub/fsr/html/index.en.html>>.

⁸⁶ Examples are the U.S. Financial Stability Oversight Council (FSOC), created under Dodd-Frank, the Financial Policy Committee (FPC), a new prudential regulator as a subsidiary of the Bank of England, or the European Systemic Risk Board (ESRB) as part of the new EU architecture.

⁸⁷ Masaaki Shirakawa, *International financial stability as a public good*, Keynote address by Mr Masaaki Shirakawa, Governor of the Bank of Japan, at a high-level seminar, co-hosted by the Bank of Japan and the International Monetary Fund, Tokyo, 14 October 2012, available at <<http://www.bis.org/review/r121015c.pdf>>; John C. Coffee, Jr., *Extraterritorial Financial Regulation: Why E.T. Can't Come Home*, 99 CORNELL L. REV. 1259, 1268 (2014). See already Michel Camdessus, *International Financial and Monetary Stability: A Global Public Good*, in REFORMING THE INTERNATIONAL MONETARY AND FINANCIAL SYSTEM 9 (Peter B. Kenen & Alexander K. Swoboda, eds., 2000); Geoffrey Underhill, *The Public Good versus Private Interests and the Global Financial and Monetary System in THE MARKET AND THE PUBLIC DOMAIN? GLOBAL GOVERNANCE AND THE ASYMMETRY OF POWER* 274 (Daniel Drache, ed., 2001). The first description of a public good is usually attributed to Paul A. Samuelson, *The Pure Theory of Public Expenditure*, 36 Review of Economics and Statistics 387 (1954).

⁸⁸ Shirakawa, *supra* note 87.

⁸⁹ See Jan Lepoutre & Matthias Thiemann, *Global challenges, local responses: governing the “commons” in the banking industry*, Unpublished Working Paper, 2014; Coffee, *supra* note 87, at p. 1269. For the basic “tragedy of the commons” concept, see Elinor Ostrom, GOVERNING THE COMMONS: THE EVOLUTION OF INSTITUTIONS FOR COLLECTIVE ACTION (1990).

economy. The ensuing competition for lower standards worldwide may also seem attractive for banks, and we have seen above that they may even fuel the process themselves by further lobbying for change and deregulation. However, this process jeopardizes the financial system as a whole: the worldwide financial market does not stop at national borders. Today's financial institutions are highly interconnected, and financial services are provided across borders. Were the financial institution that had been enticed to move trading to a "lax" jurisdiction to fail, the consequences of this failure would have to be borne by the worldwide community, with potentially dramatic consequences.

Banks, as several severe banking crises throughout history have demonstrated, are fragile institutions. This is to a large extent unavoidable and is the direct result of the core functions they perform in the economy, in particular the optimal allocation of credit.⁹⁰ The fragility of banking makes them particularly susceptible to crises – and underscores the importance of sound supervision standards. At the same time, worldwide competition and the fight for high returns give banks strong incentives to circumvent prudent regulations, select supervisors that are more lenient towards their business model and allow them to take excessive risks. Taken both elements together, the danger is that a selection of soft regulatory standards will push for the proverbial race to the bottom worldwide.⁹¹

The risk described above has been recognized by international meta-regulators and addressed where they have the legislative authority to do so. The E.U. framework for jurisdictional choice of financial service providers is a case in point.⁹² As is well-known, the general E.U. treaty architecture normally allows countries to run a company registered in one E.U. Member State, but doing its business exclusively in another. The much-discussed *Centros* case and its progeny opened up arbitrage opportunities for entrepreneurs to select a jurisdiction of choice, in some ways resembling to the Delaware effect described above.⁹³ However, for companies of the

⁹⁰ In fact, the very business model of banks is, and has to be fragile. Banks take short-term sources of finance, such as deposits from savers and money market loans, and turn them into long-term credit: they thus help to allocate funds to their most efficient use. As this process is susceptible to a bank run, banking is an inherently fragile business.

⁹¹ James R. Barth, Gerard Caprio & Ross Levine, *RETHINKING BANK REGULATION: TILL ANGELS GOVERN* 68 (Cambridge University Press, Cambridge, 2006); Acharya et al., *supra* note 82.

⁹² See Jonathan Faull, *Some legal challenges of financial regulation in the EU*, Ninth Slynn Foundation Lecture, March 7, 2011, available at <<http://www.slynn-foundation.org/UserFiles/File/Slynn%20Lecture.pdf>>, at p. 11: "Without a single set of rules, [E.U.] Member States are not able to prevent regulatory competition and arbitrage to the detriment of financial stability."

⁹³ For a comparison of EU regulatory competition in corporate law to its Delaware counterpart, see Luca Enriques, *EC Company Law and the Fears of a European Delaware*, 15 *EUR. BUS. L. REV.* 1259 (2004); Robert R. Drury, *The 'Delaware Syndrome': European Fears and Reactions*, [2005] *J. BUS. L.* 709 (2005); Christian Kirchner, Richard W. Painter & Wulf A. Kaal, *Regulatory Competition in EU Corporate Law After Inspire Art: Unbundling Delaware's Product for Europe* [2005] *EUR. COMPANY*

financial sector, E.U. law makes an explicit exception to this rule. Banks,⁹⁴ insurance companies,⁹⁵ investment funds⁹⁶, hedge funds⁹⁷ and securities traders⁹⁸ are required, according to E.U. secondary law, to keep their registered office in the same E.U. Member State as their “head office”.⁹⁹ The “head office” is a concept that denotes something similar to the “center of main operations”, and the intention is clear: this rule seeks to give the country of registration the possibility to enforce supervision decisions effectively. The origins of this system go back to the famous collapse of the Bank for Credit and Commerce International (BCCI) in 1995, where regulators considered that a more effective supervision of credit institutions by their home state was necessary.¹⁰⁰ The legal texts of today explain in their considerations that one of their explicit goals is to reduce arbitrage opportunities where an institution would attempt to register in a given country only in order to circumvent legal rules or supervisory practices in another country.¹⁰¹

& FIN. L. REV. 159 (2005); Didier Martin & Forrest G. Alogna, *New Delaware*, WALL ST. J., December 20, 2007.

⁹⁴ DIRECTIVE 2013/36/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 26 JUNE 2013 on access to the activity of credit institutions and the prudential supervision of credit institutions and investment firms, amending Directive 2002/87/EC and repealing Directives 2006/48/EC and 2006/49/EC, [2013] OJ L176/338 (“CRD IV”). See Article 13(2): *Each Member State shall require that: (a) a credit institution which is a legal person and which, under its national law, has a registered office, has its head office in the same Member State as its registered office; [...].*

⁹⁵ DIRECTIVE 2009/138/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 25 NOVEMBER 2009 on the taking-up and pursuit of the business of Insurance and Reinsurance (SOLVENCY II), [2009] OJ L335/1. See Article 20: *Member States shall require that the head offices of insurance and reinsurance undertakings be situated in the same Member State as their registered offices.*

⁹⁶ DIRECTIVE 2009/65/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 13 JULY 2009 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) [2009] OJ L302/32, Article 7(1): “Without prejudice to other conditions of general application laid down by national law, the competent authorities shall not grant authorisation to a management company unless the following conditions are met: [...] (d) the head office and the registered office of the management company are located in the same Member State.”

⁹⁷ DIRECTIVE 2011/61/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 8 JUNE 2011 on Alternative Investment Fund Managers and amending Directives 2003/41/EC and 2009/65/EC and Regulations (EC) No 1060/2009 and (EU) No 1095/2010, [2011] OJ L174/1, Article 8(1): “The competent authorities of the home Member State of the AIFM shall not grant authorisation unless: [...] (e) the head office and the registered office of the AIFM are located in the same Member State.”

⁹⁸ DIRECTIVE 2014/65/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL OF 15 MAY 2014 on markets in financial instruments and amending Directive 2002/92/EC and Directive 2011/61/EU (“MiFID”), [2014] OJ L173/349, Article 5(4): *Each Member State shall require that: (a) any investment firm which is a legal person have its head office in the same Member State as its registered office; [...].*

⁹⁹ See on the historical background Gunnar Schuster & Jens-Hinrich Binder, *Die Sitzverlegung von Finanzdienstleistern innerhalb der Europäischen Gemeinschaft*, 58 WERTPAPIER-MITTEILUNGEN 1665, 1667 ff. (2004).

¹⁰⁰ Schuster & Binder, *supra* note 99, at p. 1667.

¹⁰¹ See, for example DIRECTIVE 2013/36/EU, *supra* note 94, recital 16: “The principles of mutual recognition and home Member State supervision require that Member States’ competent authorities should refuse or withdraw authorisation where factors such as the content of the activities programme, the geographical distribution of activities or the activities actually carried out indicate clearly that a

The distinction drawn between regular companies and financial firms thus relies on the fear of regulatory (or supervisory) arbitrage and illustrates the special character that arguably attaches to the financial sector. Although scandal-driven at the outset, the E.U. rule has a case in point: combining place of incorporation and center of activities is aimed at reducing the perceived risk of externalities in financial regulation, most importantly to financial stability. It can, however, not solve the problem that large financial groups move their trading to foreign subsidiaries, as we have seen above.

ii. Evidence

So far, we have treated the phenomenon of regulatory arbitrage and regulatory competition as rather theoretical concepts, underpinned by a few anecdotal illustrations. We now turn to ask what deeper evidence there is that such developments actually take place in the realities of today's financial markets.

Numerous empirical studies have documented the presence of cross-border arbitrage opportunities and financial institutions' making use of them. One of them is a study by Dong et al. (2011), who show that cross-border bank M&A deals are frequently used to expand into lightly regulated jurisdictions.¹⁰² This may suggest that the international nature of banking and the occurrence of cross-border transactions provide them with a natural way of regulatory arbitrage. The paper documents that regulators are concerned about the shareholders of their domestic banks, and that they may lower their bank regulation standards in order to provide domestic banks with an advantage over foreign banks and increase their profitability. Another, related contribution is the study by Joel Houston and colleagues, who look more generally at international bank flows (which includes all types of transfer of funds, such as lending).¹⁰³ Their data confirm that bank flows are positively related to the regulatory environment and that regulatory arbitrage is taking place: controlling for all factors, banks tend to move trading to markets with more permissive regulations. More generally, the authors claim that global banking regulation and the coordination of regulation across different markets have an important effect on the overall level of bank funding. Thus, the observed trend may undercut attempts to limit risk-taking in

credit institution has opted for the legal system of one Member State for the purpose of evading the stricter standards in force in another Member State within whose territory it carries out or intends to carry out the greater part of its activities. Where there is no such clear indication, but the majority of the total assets of the entities in a banking group is located in another Member State, the competent authorities of which are responsible for exercising supervision on a consolidated basis, responsibility for exercising supervision on a consolidated basis should be changed only with the agreement of those competent authorities.”

¹⁰² Hui Dong, Frank Song & Libin Tao, *Regulatory Arbitrage: Evidence from Bank Cross-border M&As*, Working Paper, 2011.

¹⁰³ Joel F. Houston, Chen Lin & Yue Ma, *Regulatory Arbitrage and International Bank Flows*, 67 J. FIN. 1845 (2012).

the aftermath of the current crisis, unless policy makers are able to take the steps necessary to enhance global coordination of banking regulation.¹⁰⁴

A recent paper by Andrew Karolyi and co-author examines the contributions of international bank acquisitions on the regulatory arbitrage debate.¹⁰⁵ They confirm the positive impact of laxer regulation on the acquisitions contained in their dataset, but interpret their findings as a “benign” form of regulatory arbitrage (relying on the fact that it is not only poor-performing banks that engage in such arbitrage). It is submitted here that also healthy banks can exercise considerable pressure on regulation standards and contribute to a destructive competition trend.

The evidence reviewed so far provides support for a geographical type of arbitrage. It confirms our earlier intuition that financial institutions engage in arbitrage by either moving trading or funds abroad, by acquiring other institutions, or by setting up subsidiaries. We are not aware, by contrast, of a significant number of direct, physical relocations of financial institutions themselves such as the ones threatened by Barclays and HSBC.¹⁰⁶

To find proof for *intra*-jurisdictional regulatory arbitrage, we may consider the widely-reported move by savings and loan associations in the U.S. to reorganize themselves in order to avoid oversight by their new regulator, the Office of the Comptroller of the Currency (OCC).¹⁰⁷ The Dodd-Frank Act had closed their previous regulator, the Office of Thrift Supervision (OTS), and moved them to the OCC.¹⁰⁸ Many of the traditionally small associations however claim that the OCC is only equipped to deal with big institutions and not able to adequately address their specific situations. Newspaper reports state that within less than a year after the inception of OCC oversight, already 35 out of 600 savings and loan associations have attempted to avoid the new supervisor: some are trying to change their status to a so-called “credit union” (through charter conversion or by way of an acquisition), and many others are moving from being nationally chartered to state oversight.¹⁰⁹ This development has been interpreted as “regulator shopping” by experts, who are generally very critical of

¹⁰⁴ See also Viral V. Acharya, Paul Wachtel & Ingo Walter, *International alignment of financial sector regulation*, in *RESTORING FINANCIAL STABILITY: HOW TO REPAIR A FAILED SYSTEM* 365 (Viral V. Acharya & Matthew Richardson, eds., John Wiley & Sons, New Jersey 2009).

¹⁰⁵ G. Andrew Karolyi & Alvaro G. Taboada, *Regulatory arbitrage and cross-border bank acquisitions*, 70 J. FIN. 2395 (2015).

¹⁰⁶ See *supra* part I.

¹⁰⁷ Jessica Silver-Greenberg, *Small Banks Shift Charters to Avoid U.S. as Regulator*, N.Y. TIMES, April 2, 2012.

¹⁰⁸ The OTS had been a notoriously lax regulator, see Binyamin Appelbaum & Ellen Nakashima, *Banking Regulator Played Advocate Over Enforcer*, WASHINGTON POST, Nov. 23, 2008, available at <<http://www.washingtonpost.com/wp-dyn/content/article/2008/11/22/AR2008112202213.html>>. This may partly explain why banks are now trying to avoid the new, tougher oversight by the OCC. In fact, OTS Director James Gilleran even once said that “[o]ur goal is to allow thrifts to operate with a wide breadth of freedom from regulatory intrusion”. See *ibid.*

¹⁰⁹ Jessica Silver-Greenberg, *Small Banks Shift Charters to Avoid U.S. as Regulator*, N.Y. TIMES, April 2, 2012.

the trend.¹¹⁰ Such skepticism is further corroborated by research from Sumit Agarwal and co-authors, who find that state regulators are consistently laxer in terms of bank oversight than their federal counterparts.¹¹¹

These facts all relate to arbitrage that is carried out by the financial institutions. What about their country counterparts: do we observe regulatory *competition*? A few examples suggest that the answer is yes. Competition between regulators is thereby not just confined to offshore financial centers like Bermuda or the Cayman Islands, but is present in the world's most sophisticated financial markets. In fact, competition is epitomized by the rivalry between the world's foremost financial centers, New York and London. In 2007, U.S. Senator Charles E. Schumer and New York City Mayor Michael Bloomberg released a report revealing that New York could lose its status as a global financial market without a major shift in public policy to London.¹¹² This report drastically outlined what is at stake: it claims that the regulatory environment for financial services is a major business factor not just for New York, but for the United States as a whole. Left unchanged, the report predicted that the trend could significantly negatively impact the U.S. economy, missing out on between \$ 15 billion and \$ 30 billion in financial services revenues annually by 2011.¹¹³ Those revenues, if retained, could translate into as many as thirty to sixty thousand jobs in the U.S. When speaking about its rival, the report uses phrases like the "more amenable and collaborative regulatory environment in London", the "more lenient immigration environment in London", or "the FSA's greater historical willingness to net outstanding derivatives positions before applying capital charges has also yielded a major competitive advantage for London."¹¹⁴ Since 2007, the biannually published "Global Financial Centres Index" has seen a fierce competition between the two cities.¹¹⁵

This perception of active competition by London by way of "offering" soft regulatory oversight is substantiated by actual realities.¹¹⁶ Consider the regulatory environment in the City of London prior to the 2007/08 meltdown. The U.K.'s then newly created comprehensive regulator, the Financial Services Authority (FSA), explicitly promoted a "light touch" approach to oversight. As late as 2006, the FSA

¹¹⁰ Silver-Greenberg, *supra* note 109.

¹¹¹ Sumit Agarwal, David Lucca, Amit Seru & Francesco Trebbi, *Inconsistent Regulators: Evidence from Banking*, 129 Q. J. ECON. 889 (2014).

¹¹² SUSTAINING NEW YORK'S AND THE US' GLOBAL FINANCIAL SERVICES LEADERSHIP, available at <http://www.nyc.gov/html/om/pdf/ny_report_final.pdf>.

¹¹³ *Ibid.*, at p. 19.

¹¹⁴ *Ibid.*, at p. 13.

¹¹⁵ After repeatedly changing place, the current version of the report, THE GLOBAL FINANCIAL CENTRES INDEX 17 (March 2015), sees New York again claiming the top place in the ranking. The report is available at <http://www.longfinance.net/images/GFCI17_23March2015.pdf>.

¹¹⁶ See on the broader context Jim O'Neill and Sandra Lawson, *Is New York Doomed?*, GLOBAL ECONOMICS WEEKLY Issue No. 07/06 (Feb. 14, 2007) at 1.

chief executive, John Tiner, promoted a “principles-based” approach to regulation: “Firms’ managements – not their regulators – are responsible for identifying and controlling risks. A more principles-based approach allows them increased scope to choose how they go about this. In short, the use of principles is a more grown-up approach to regulation than one that relies on rules.”¹¹⁷ It is commonly accepted now that the FSA thereby did not just act negligently, but instead actively lured business to come to London.¹¹⁸ Ultimately, in the wake of the crisis, this approach was heavily criticized and led to the FSA being split up.¹¹⁹

These days, the competition between the two financial centers is still ongoing – although rivals from Asian countries have been successful in catching up, and Singapore and Hong Kong are now perceived as serious competitors.¹²⁰ And regulatory reforms are still more or less aimed at winning a market share on the international financial market. Consider the changes announced by U.K. Chancellor of the Exchequer George Osborne in 2013 to attract investment funds to the U.K. *Inter alia*, Osborne promised improvements in regulation, tax rates and marketing to ensure Britain’s investment management sector could match competition from Luxembourg, Ireland and Hong Kong.¹²¹ This strategy goes back to original plans from the previous (Labour) government, based on a 2009 report, “Asset management: the UK as a global centre”.¹²² This report was published by the Asset Management Working Group, which was co-chaired by then-Chancellor Alistair Darling and Robert Jenkins, then chairman of the IMA. *Inter alia*, the report stated that the UK should aim to

¹¹⁷ Speech by John Tiner, Chief Executive, FSA, Principles based regulation: the EU context, Oct. 13, 2006, APCIMS Annual Conference, Hotel Arts, Barcelona, available at <http://www.fsa.gov.uk/library/communication/speeches/2006/1013_jt.shtml>. See also the speech by Margaret Cole, (then) Director of Enforcement of the FSA at Fordham University School of Law, New York, on October 17, 2006, entitled *The U.K. FSA: Nobody Does It Better?*, 12 FORDHAM J. CORP. & FIN. L. 259 (2007).

¹¹⁸ See the comment by John Driffill, giving evidence to the House of Commons: “I guess the global regulatory design is to prevent a kind of regulatory race to the bottom; perhaps one saw something of that over the last 20 years, with Britain as one of the winners. It now appears that is a much less attractive type of race to win because Britain led the way and the whole thing blew up in its face.” House of Commons, Treasury Committee, BANKING CRISIS: INTERNATIONAL DIMENSIONS, Eleventh Report of Session 2008-09, at p. Ev 19. See also Jill Treanor, *Farewell to the FSA – and the bleak legacy of the light-touch regulator*, THE OBSERVER, March 24, 2013.

¹¹⁹ Effective April 1, 2013, the FSA’s responsibilities were then split between two new agencies (the Prudential Regulation Authority and the Financial Conduct Authority) and the Bank of England.

¹²⁰ Michael Pooler, *New York and London vie for crown of world’s top financial centre*, FIN. TIMES, October 2, 2014.

¹²¹ Chris Flood, *UK ‘late to game’ with fund ambition*, FIN. TIMES, April 8, 2013, p. FTfm7. The government appears to be successful with this strategy. Of the top five European locations for fund domicile, the UK saw the biggest increase in assets in 2013 (10.9%), see FTSEGlobalMarkets, *UK funds under management reach record £6.2trn*, September 29, 2014, available at <<http://www.ftseglobalmarkets.com/news/uk-funds-under-management-reach-record-C2%A362trn.html>>.

¹²² Asset Management Working Group, ASSET MANAGEMENT: THE UK AS A GLOBAL CENTRE, November 2009, available at <http://www.betterregulation.com/external/fin_assetmanagement_091109.pdf>.

become the “domicile of choice” for investment funds, adding that “Dublin and Luxembourg believe passionately that their fiscal policies toward fund activity accrue benefit to the nation as a whole”.¹²³

More recently still, the U.K. government has signaled a change of course to the post-crisis tough line and announced an “end to banker bashing” and a “new settlement” with the financial industry.¹²⁴ This coincides with heavy and reinvigorated banks’ lobbying efforts to phase out post-crisis regulatory achievements. A first victim of the government’s new stance was Martin Wheatley, formerly chief executive of the FCA, who was forced to resign due to his tough and uncompromising approach to financial institutions.¹²⁵ If this trend continues, the pendulum might be presently swinging bank into the opposite direction – and the spirit from the “light-touch” regulation years does not seem far away.

One puzzle remains: how can regulatory competition work *within* the E.U., given that E.U. federal regulation has harmonized large portions of financial regulation?¹²⁶ The answer is best given by one of the main protagonists itself: Luxembourg, another E.U. financial champion, which likes to promote itself as a financial center for fund management and wealth investment.¹²⁷ On an advertising website for investment in the country, a government agency explains that “As a member of the European Union, Luxembourg has a legal and regulatory environment that is largely determined by the numerous Directives and Regulations adopted at a Community [sic] level. However, *when transposing these standards into domestic law*, the legislative authority has skillfully *taken advantage of the margins for manoeuvre available* within the Directives to create a legal environment that *promotes the international character of the financial centre.*”¹²⁸ That is to say: it is the need for implementation of most E.U. legislation into national law that allows Member States to continue to diverge in terms of how strict they shape the regulatory framework. The objective of creating a financial center with an “international character” appears to be a euphemism for attracting business from abroad. Add to this that the enforcement style even of harmonized regulation (like the “light-touch” style by the former

¹²³ *ibid.*, at p. 4.

¹²⁴ George Parker, Caroline Binham & Laura Noonan, *Osborne mends fences with the City*, FIN. TIMES, June 6, 2015, at p. 1; Chris Blackhurst, *Like it or not, the age of banker bashing is coming to an end*, THE INDEPENDENT, August 6, 2015; Emma Dunkley, *‘Banker Bashing’ draws to an end as watchdog scraps review*, FIN. TIMES, December 31, 2015, at p. 1.

¹²⁵ Lindsay Fortado, George Parker, Martin Arnold & Caroline Binham, *Top City financial regulator quits*, FIN. TIMES, July 18, 2015, at p. 1.

¹²⁶ For a pre-FSAP perspective, see Gerard Hertig, *Regulatory Competition for EU Financial Services*, 3 J. INT’L. ECON. L. 349 (2000).

¹²⁷ Luxembourg has captured more than 25% of European assets in mutual funds.

¹²⁸ See <<http://www.luxembourgforfinance.com/why-luxembourg/legal-environment/banks>> (emphasis added).

FSA¹²⁹) may vary dramatically across the E.U., and it becomes obvious that E.U. harmonization of the framework for financial services does not prevent the occurrence of competitive behavior.

iii. Potential benefits

Apart from underlining the risks that have been addressed above, the literature also emphasizes the potential occurrence of *positive* effects that can result from regulatory competition in financial markets.¹³⁰ For example, the bank M&A study by Dong et al. finds that banks prefer to expand into jurisdictions with a regulatory environment that is more independent from political influence.¹³¹ They interpret this as mitigating the risk that policy-makers exert self-serving influence on banks, making them divert the flow of credit to politically connected firms.¹³² In this way, arbitrage could promote independent regulatory supervision globally and thus support the efficiency with which banks can allocate credit. A silver lining is also reported by Houston et al., who demonstrate that the race to laxity “is not everything”. Their data show that light-touch regulation alone is not attractive, but that financial institutions also look for a more stable legal environment that offers, for example, a sound protection of property rights and strong creditor rights.¹³³ This remarkable finding suggests that countries can also promote themselves in the worldwide competition by signaling that they cater for strong legal institutions.¹³⁴

It is therefore no surprise that a number of researchers take a positive view of regulatory competition in the financial sector and conclude that “a race to the top in capital regulations is an equally plausible scenario as a race to the bottom”.¹³⁵ They cite the example that countries like Switzerland or the U.K. have deliberately enacted

¹²⁹ See, in surprisingly open language, Cole, *supra* note 117, at p. 279: “When I talk about moving to more principles-based regulation, of course we can’t ditch the rulebook. [...] Whenever we have to look at the implementation of a new Directive, as we do with some degree of regularity, we look very carefully at what we need to bring in, how far we can go to satisfy the Directive without going any further.”

¹³⁰ For a general assessment, demonstrating the positive effects of regulatory competition in financial markets, see James A. Wilcox, *The Increasing Integration and Competition of Financial Institutions and of Financial Regulation*, 22 RESEARCH IN FINANCE 215, 225 ff. (2005).

¹³¹ Dong et al., *supra* note 102, at p. 5.

¹³² The study thereby relies on Thorsten Beck, Asli Demirgüç-Kunt & Ross Levine, *Bank supervision and corruption in lending*, 53 J. of Monetary Economics 2131 (2006).

¹³³ Houston et al., *supra* note 103, at p. 1848.

¹³⁴ Compare this finding with the theory on a “first mover” advantage: see *infra* section IV.D.

¹³⁵ Andreas Haufler & Ulf Maier, *Regulatory competition in credit markets with capital standards as signals*, Working Paper 2013, available at <<http://hdl.handle.net/10419/79769>>. See also the positive assessment by Anna Manasco Dionne & Jonathan Macey, *Offshore Finance and Onshore Markets: Racing to the Bottom, or Moving toward Efficient?*, in OFFSHORE FINANCIAL CENTERS AND REGULATORY COMPETITION 8 (Andrew P. Morriss, ed., 2010).

bank capital standards that substantially exceed the common rules adopted under Basel III.¹³⁶

This fits into the present narrative. Regulators who act under market pressure might discover “quality” as a selling point, in particular on a worldwide market place where reliable business standards are in high demand. So apart from the belief that, for example, high capital requirements are functional for domestic banks, they might signal to the outside world that the banking sector is safer than in other jurisdictions, and that regulatory standards are generally higher. It is not inconceivable that countries seek to use regulation almost as a marketing tool. Add to this the other benefits of allowing competition: as we have seen above, regulatory diversity promises to permit regulators’ mutual learning; it encourages experimentation and creativity in offering an advantageous business environment.¹³⁷ It is, in short, the famous “discovery procedure”, which Friedrich von Hayek described almost 50 years ago.¹³⁸

In conclusion, then, our assessment is ambivalent. The general sympathy for flexibility and a dynamic process with learning, experimentation and updating is confronted with potentially dramatic consequences for financial stability as a public good. The challenge in formulating regulatory responses is therefore to single out the positive side—to harness the benefits of competition—and to ensure at the same time that opportunistic free-riding does not undermine global financial stability. We will turn to the various regulatory solutions to the dilemma now.

IV. SOLUTIONS

What are possible responses to the occurrence of regulatory competition in financial markets and to the problems that have been identified? The law provides for a range of possibilities to address the topic, on both the national and the international levels, each of which will be considered in the following.

A. *Harmonization*

The most obvious response, which has already been mentioned occasionally, is to promote worldwide efforts towards *harmonization* or even *unification*. The logic is that identical or at least similar legal standards and rules will reduce the incentive to

¹³⁶ Haufler & Maier, *supra* note 135, at p. 2.

¹³⁷ Ethiopis Tafara & Robert J. Peterson, *A Blueprint for Cross-Border Access to U.S. Investors: A New International Framework*, 48 HARV. INT’L. L. J. 31, 52 (2007). See also Wilcox, *supra* note 130, at p. 226, who describes the different (U.S.) state regulatory systems as “laboratories for innovations.”

¹³⁸ Friedrich A. von Hayek, *Der Wettbewerb als Entdeckungsverfahren*, in FREIBURGER STUDIEN (1969). For an English translation, see F.A. Hayek, *Competition as a Discovery Procedure*, translated by Marcellus S. Snow, 5 Q. J. AUSTRIAN ECON. 9-23 (2002).

arbitrage, and accordingly to regulatory competition.¹³⁹ This is clearly spelt out by the G20 London summit 2009, where leaders stated that “we [...] agree to establish the much greater consistency and systematic cooperation between countries, and the framework of internationally agreed high standards, that a global financial system requires. Regulators and supervisors must [...] reduce the scope for regulatory arbitrage”.¹⁴⁰ Commentators worldwide call for increased efforts to harmonize regulatory standards in order to avoid or mitigate harmful developments like a race to the bottom.¹⁴¹

The most prominent example of a global effort to harmonize financial law is the worldwide move towards harmonization of banks’ capital requirements, effected by the Basel Accords. The origins of these accords stem from a number of bank failures in the 1970s, which saw the establishment of the Basel Committee on Banking Supervision (BCBS), designed as a forum for regular cooperation between its member countries on banking supervisory matters. Its aim was—and still is—to enhance financial stability by improving supervisory know-how and the quality of banking supervision worldwide. The Committee sought to achieve this inter alia by encouraging harmonized supervisory standards. Whereas the Basel Committee’s decisions as such have no legal force, they are adopted in the expectation that individual national authorities will implement them. In the 1980s, capital requirements became the main focus of this development, and there was a strong recognition among central bankers of the overriding need for a multinational accord to strengthen the stability of the international banking system and to remove a source of competitive inequality arising from differences in national capital requirements. Accordingly, the first common position on this issue became known as the Basel I accord from July 1988.¹⁴² It has been updated and renewed to this day with the Basel II accord from 2004¹⁴³ and, most recently, Basel III,¹⁴⁴ which was adopted in 2010, and is currently being implemented worldwide.

¹³⁹ Jonathan R. Macey, *Regulatory Globalization as a Response to Regulatory Competition*, 52 EMORY L.J. 1353, 1362 (2003). See also Alan D. Morrison & Lucy White, *Level Playing Fields in International Financial Regulation*, 64 J. FIN. 1099 (2009).

¹⁴⁰ G20, LONDON SUMMIT—LEADERS’ STATEMENT, April 2, 2009, available at <https://www.g20.org/sites/default/files/g20_resources/library/London_Declaration.pdf>.

¹⁴¹ See e.g. the Confederation of British Industry, written evidence to the House of Commons: “We support the desire to improve rule-making in a co-ordinated manner, eliminating harmful national differences between regulatory regimes and regulatory arbitrage and providing oversight and ‘best practice peer review’ of national supervisory operations.” House of Commons, Treasury Committee, BANKING CRISIS: INTERNATIONAL DIMENSIONS, Eleventh Report of Session 2008-09, at p. Ev 76.

¹⁴² Basle Committee on Banking Supervision, INTERNATIONAL CONVERGENCE OF CAPITAL MEASUREMENT AND CAPITAL STANDARDS, July 1988, available at <<http://www.bis.org/publ/bcbs04a.pdf>>.

¹⁴³ Basel Committee on Banking Supervision, INTERNATIONAL CONVERGENCE OF CAPITAL MEASUREMENT AND CAPITAL STANDARDS – A REVISED FRAMEWORK, June 2004, available at <<http://www.bis.org/publ/bcbs107.htm>>.

In a similar vein, as a response to the global financial crisis, the G20 group of the world's largest economies (itself promoted in importance by the crisis) established the Financial Stability Board (FSB), *inter alia* with a view of agreeing common approaches to financial markets regulation and to coordinate the work of national financial authorities and international standard setting bodies.¹⁴⁵ Just like the BCBS, the FSB is hosted by the Bank for International Settlements (BIS) and brings together national authorities responsible for financial stability in significant international financial centers, international financial institutions, sector-specific international groupings of regulators and supervisors, and committees of central bank experts. For the past years, the FSB has been the de facto driver of regulatory standards across the leading jurisdictions, gaining more importance over time.

On a smaller, more regional level, the entire E.U. architecture for financial services can also be understood as a counter-measure to regulatory competition and arbitrage on a regional level.¹⁴⁶

Where is this development heading? The strongest claim is made by the de Larosière Report of 2009, which proposed a new architecture for market oversight in Europe and making the case for a powerful international regulator. The Report states in its final considerations that “[o]ver the medium term, thought might be given to establishing a full international standard-setting authority [...]. The objective should be to put in place an international standard setting process which would be binding on jurisdictions and which would ensure implementation and enforcement of international standards. This would have to be supplemented by providing the IMF with the tasks of surveying the enforcement of these standards.”¹⁴⁷ This bold statement is mirrored by a number of commentators who propose the creation of a truly international standard setter in the form of an international organization (instead of the more collegiate structure of the Basel accords or the FSB). Proposals to create a “World Finance [or Financial] Organization”, modelled after the World Trade Organization (WTO), have so far been utopian however, and are most likely not realized in the current environment.¹⁴⁸

¹⁴⁴ Basel Committee on Banking Supervision, *BASEL III: INTERNATIONAL FRAMEWORK FOR LIQUIDITY RISK MEASUREMENT, STANDARDS AND MONITORING*, December 2010, available at <<http://www.bis.org/publ/bcbs188.pdf>> (revised version from 2013 at <<http://www.bis.org/publ/bcbs238.pdf>>).

¹⁴⁵ Chris Brummer, *SOFT LAW AND THE GLOBAL FINANCIAL SYSTEM – RULE MAKING IN THE 21ST CENTURY* 72 ff. (2012).

¹⁴⁶ Jonathan Faull, *Some legal challenges of financial regulation in the EU*, Ninth Slynn Foundation Lecture, March 7, 2011, available at <<http://www.slynn-foundation.org/UserFiles/File/Slynn%20Lecture.pdf>>, at p. 11: “Without a single set of rules, [E.U.] Member States are not able to prevent regulatory competition and arbitrage to the detriment of financial stability.”

¹⁴⁷ Jacques de Larosière (Chair), *THE HIGH-LEVEL GROUP OF FINANCIAL SUPERVISION IN THE EU, REPORT*, Brussels, February 25, 2009, at p. 61.

¹⁴⁸ For corresponding proposals, see Barry J. Eichengreen, *Out of the Box Thoughts about the International Financial Architecture*, IMF Working Paper WP/09/116 (2009); Kern Alexander et al.,

Trends towards global standard-setting have been frequently criticized. The first problem is that worldwide standard-setting, as envisaged by the de Larosière Report, may remain an illusion, as political consensus is exceedingly difficult to achieve. Political economy considerations suggest that policy-makers have few incentives to cooperate, instead of free-riding on the efforts by others. This collective action problem is exacerbated by the theoretical need to obtain agreement by the entire world – which seems almost impossible to achieve. Further considerations suggest that worldwide incentives to achieve regulatory standards differ, since countries have been affected by the financial crisis to a different extent.¹⁴⁹ Academic comment and practical reality react by a more modest approach: it may be sufficient if at least those countries with a substantial financial market can agree at least on a broad set of principles. Such a consensus would amount to *de facto* worldwide standards.¹⁵⁰

On a more problematic note, harmonized standards in financial regulation are very contentious *in substance* and have received severe criticism. The complaint is that they undermine all the virtues of competition: they are said to stifle innovation, cut off experimentation with standards, creativity and mutual learning altogether.¹⁵¹ This is corroborated by solid evidence. A research team under the auspices of the World Bank examined the effects of the Basel I and II accords in a long-term study, spanning the years from 1998 to 2006. They come to the sobering conclusion that harmonized capital standards have not improved banking-system stability, enhanced the efficiency of intermediation, or reduced corruption in lending.¹⁵² According to this research, the only parts of the Basel Framework that have had a positive impact on

GLOBAL GOVERNANCE OF FINANCIAL SYSTEMS: THE INTERNATIONAL REGULATION OF SYSTEMIC RISK 162 (2006). See further a proposal to merge the G20 with the IMF Council, as proposed by Malcolm D. Knight and Guillermo Ortiz, MULTILATERAL SURVEILLANCE: ENSURING A FOCUS ON KEY RISKS TO GLOBAL STABILITY, External Study for the IMF 2014 Triennial Surveillance Review (July 30, 2014), available at <<http://www.imf.org/external/np/pp/eng/2014/073014f.pdf>>. For overall discussion, see Rosa M. Lastra, *Do We Need a World Financial Organization?*, 17 J. INT'L ECON. L. 787 (2014); Brummer, *supra* note 145, chapter 6.

¹⁴⁹ Investment Management Association, written evidence to the House of Commons, Treasury Committee, BANKING CRISIS: INTERNATIONAL DIMENSIONS, Eleventh Report of Session 2008-09, at p. Ev 78.

¹⁵⁰ See Dong et al., *supra* note 102. In fact, the Basel Accords are an example of such an approach.

¹⁵¹ Sean J. Griffith, *Substituted Compliance and Systemic Risk: How to Make a Global Market in Derivatives Regulation*, 98 Minn. L. Rev. 1291, 1345-6 (2014); Christian Tietje & Matthias Lehmann, *The Role and Prospects of International Law in Financial Regulation and Supervision*, 13 J. INT'L ECON. L. 663, 679 (2010).

¹⁵² James R. Barth, Gerard Caprio, Jr. & Ross Levine, RETHINKING BANK REGULATION: TILL ANGELS GOVERN (2006). See also their follow-up work: James R. Barth, Gerard Caprio, Jr. & Ross Levine, *Bank Regulations are Changing: For Better or Worse?*, 50 COMP. ECON. STUD. 537 (2008); James R. Barth, Gerard Caprio, Jr. & Ross Levine, *The Evolution and Impact of Bank Regulations*, World Bank Policy Research Working Paper # 6288 (December 2012); James R. Barth, et al., *Do bank regulation, supervision and monitoring enhance or impede bank efficiency?*, 37 J. BANKING & FIN. 2879 (2013).

banks' resilience are market-based components, such as greater disclosure requirements.¹⁵³ In other words: the only useful tool in the Basel toolkit is the one promoting more competition and less harmonization.

More crucially yet, academic comment holds that global harmonization may even be a source of financial instability itself. One of the most vociferous critics of the Basel accords is Professor Roberta Romano, who argues that they encourage parallel behavior and thus create systemic risk.¹⁵⁴ If this is only partly true, it would mean that the one problem (competition leading to externalities and instability) is replaced by the other (worldwide unification and instability). In a similar vein, Professors Gordon and Mayer argue that regulatory harmonization at least on the micro-prudential dimension is not desirable and potentially harmful for the cause of systemic stability in international finance.¹⁵⁵ Nevertheless, they argue that stability requires strong elements of regulatory harmonization on the macro-prudential dimension, not only because of the direct and indirect linkages among firms but because systemic stability is an expensive public good that invites free-riding.¹⁵⁶ Finally, Professor Charles Whitehead posits that regulatory coordination can be destructive: By promoting coordination, regulations and standards can erode key presumptions underlying financial risk management, reducing its effectiveness and magnifying the systemic impact of a downturn in the financial markets.¹⁵⁷ Similar standards can, according to this line of thought, create similar risk-taking, similar risk-models and parallel behavior, ending in herding and group-think.¹⁵⁸ Thus, the paradox that these writers describe is that although harmonized regulation can help reduce systemic risk, it can also become a source for systemic risk itself.¹⁵⁹

¹⁵³ Barth, Caprio & Levine, *RETHINKING BANKING REGULATION*, *supra* note 152, at pp. 229, 255.

¹⁵⁴ Roberta Romano, *For Diversity in the International Regulation of Financial Institutions: Critiquing and Recalibrating the Basel Architecture*, 31 *YALE J. ON REG.* 1 (2014).

¹⁵⁵ Jeffrey Gordon & Colin Mayer, *The Micro, Macro and International Design of Financial Regulation*, Working Paper 2012, available at <<http://ssrn.com/abstract=2047436>>.

¹⁵⁶ Gordon & Mayer *ibid.* The paper is generally skeptical towards bank regulation in general and regulatory harmonization is as far as they have been misdirected towards micro-prudential issues of individual institutions and especially their corporate governance standards. Not only do these policies fail to address the underlying systemic problems, according to the authors, they exacerbate them. There are difficulties of identification, unintended consequences and homogeneity associated with micro-prudential rules that create interdependencies and externalities where none previously existed. Regulation, and in particular its harmonization, is therefore causing the very problem that it is seeking to address.

¹⁵⁷ Charles K. Whitehead, *Destructive Coordination*, 96 *CORNELL L. REV.* 323 (2011).

¹⁵⁸ Bank for International Settlements, Committee on the Global Financial System, *LONG-TERM ISSUES IN INTERNATIONAL BANKING* 31 (CGFS Papers No. 41, July 2010): "Given its strong role in shaping international intermediation in the past, regulation has an important role to play in fostering cross-border knowledge transfer. The end result, however, should not be the convergence to a single risk assessment or risk management framework, which would encourage herd behaviour and weaken financial stability." Available at <<http://www.bis.org/publ/cgfs41.pdf>>. See also Tietje & Lehmann, *supra* note 151, at p. 680.

¹⁵⁹ Whitehead, *supra* note 157, at p. 327.

A number of scholars have recognized the shortcomings of true legal harmonization and adhere as a substitute to the concept of “soft law”.¹⁶⁰ That is, in the absence of a true worldwide regulator and in the absence of any realistic worldwide norm-setting, countries may at the most agree to common standards outside of strict legal enforceability. Instead, “soft” legal standards share many advantages, both in substance—among them, lower sovereignty costs, and flexibility in their adjustment¹⁶¹—and in facilitating political agreement.¹⁶² Again, these scholars concede that a true worldwide agreement is unrealistic even for “soft” standards, and they see regional agreements, for example those entered into by the G8 or G20 nations, as the only genuine option.¹⁶³ Game-theoretic models see the emergence of a global standard as a possibility if the “great economic powers” were to reach consensus on a preferred regulatory standard.¹⁶⁴

Add to this the *practical problems* that come with the process of regulatory harmonization: Considerations from political economy suggest that harmonizing national laws worldwide (!) is an extremely contentious, lengthy and difficult process and fraught with political controversies.¹⁶⁵ Attempts to universalize substantive regulation can quickly develop into local protectionism as internal political and economic interests clash with international expectations.¹⁶⁶ Further, the very process of harmonization risks creating new regulatory arbitrage opportunities because the pace of implementing legal change will be different across countries.¹⁶⁷ And global standards such as the Basel agreements almost invite market participants to find ways around them.¹⁶⁸

¹⁶⁰ Most notably, Chris Brummer, *SOFT LAW AND THE GLOBAL FINANCIAL SYSTEM – RULE MAKING IN THE 21ST CENTURY* 72 ff. (2012). See also Anne-Marie Slaughter, *A NEW WORLD ORDER* (2004); Andrew T. Guzman & Timothy L. Meyer, *International Soft Law*, 2 J. LEGAL ANALYSIS 171, 179 (2010); David Zaring, *Finding Legal Principle in Global Financial Regulation*, 52 VA. J. INT’L L. 683, 687 (2012).

¹⁶¹ Brummer, *supra* note 160, at p. 124 ff.

¹⁶² Brummer, *supra* note 160, at p. 128 ff.

¹⁶³ Viral V. Acharya, Paul Wachtel & Ingo Walter, *International alignment of financial sector regulation*, in *RESTORING FINANCIAL STABILITY: HOW TO REPAIR A FAILED SYSTEM* 365, 374 f. (Viral V. Acharya & Matthew Richardson, eds., John Wiley & Sons, New Jersey 2009).

¹⁶⁴ Daniel W. Drezner, *Globalization, Harmonization, and Competition: The Different Pathways to Policy Convergence*, 12 J. EUR. PUBLIC POLICY 841, 844 ff (2005). See also Eric J. Pan, *Four Challenges to Financial Regulatory Reform*, 55 VILL. L. REV. 743, 770 (2010): “any cooperative regulatory framework relationship that develops between the United States and European Union will set the dominant framework for prudential supervision of cross-border institutions for the rest of the world.” Cf. Coffee, *supra* note 87, at p. 1288.

¹⁶⁵ Annelise Riles, *Managing Regulatory Arbitrage: A Conflict of Laws Approach*, 47 CORNELL INT’L L. J. 63, 66 (2014).

¹⁶⁶ Gillian Tett, *Beware pitfalls of rulemakers pursuing their own agendas*, FIN. TIMES, May 4, 2012, at p. 30.

¹⁶⁷ Riles, *supra* note 165, at p. 66.

¹⁶⁸ David Jones, *Emerging problems with the Basel Capital Accord: Regulatory capital arbitrage and related issues*, 24 J. of Banking & Finance 35 (2000).

B. Alternative doctrinal approaches

Against the backdrop of such vehement criticism and political conflict, scholars and policymakers have attempted to develop alternative concepts to tackle the problem of destructive regulatory competition.

Some propose a “mix” of different regulatory styles instead of full harmonization. That is, depending on the context, they prescribe regulators a combination of centralization, competition, and privatization.¹⁶⁹ As one commentator put it, “it seems quite possible that different allocations of regulatory authority may, in fact, be appropriate in different contexts”.¹⁷⁰ The difficulty, of course, is to know which concept is the right choice for which field. Further, even when scholars give more concrete prescriptions—such as the distinction between micro and macro regulation¹⁷¹—these distinctions are often less clear-cut than commonly thought. To take up this example, the distinction between micro regulation and macro regulation is obscure, to say the least, and many areas overlap or are not clearly distinguishable. Privatization or self-regulation in a field prone to high externalities has not been terribly successful.¹⁷²

Others have argued that an international framework such as the Basel standards should allow for a certain degree of diversity. Professor Roberta Romano is a leading advocate of this plan: under her concept, countries subject to the Basel accords should be allowed to deviate from the international standards under the oversight of an international arbiter.¹⁷³ This, she argues, would both preserve the benefits of a common international consensus and at the same time promote a limited degree of competition and experimentation.¹⁷⁴ Proposals have been made to establish a “review committee”, possibly the FSB, which would be tasked to ascertain whether a proposed deviation from the harmonized standards could be anticipated to impact financial stability. Only a clear and robust answer in the affirmative would allow the review committee to block the proposed deviation.¹⁷⁵

From other quarters comes a reminder that private international law (of conflict of laws) might help curb destructive competition.¹⁷⁶ It is true that changing

¹⁶⁹ For example, Gordon & Mayer, *supra* note 155, who distinguish between micro and macro regulation.

¹⁷⁰ Howell E. Jackson, *Centralization, Competition, and Privatization in Financial Regulation*, 2 THEORETICAL INQUIRIES IN LAW 4 (2001).

¹⁷¹ Gordon & Mayer, *supra* note 155.

¹⁷² For an early critique, see Frank Partnoy, *Financial Derivatives and the Costs of Regulatory Arbitrage*, 22 J. CORP. L. 211, 247 ff. (1997).

¹⁷³ Romano, *supra* note 154.

¹⁷⁴ See also, in the context of OTC derivatives, Griffith, *supra* note 151, at p. 1365 ff.

¹⁷⁵ Romano, *supra* note 154, at p. 30-31; Griffith, *supra* note 151, at p. 1366. Another, related tool would be to introduce “feedback loops” ex post. See Jan Lepoutre & Matthias Thiemann, *Global challenges, local responses: governing the “commons” in the banking industry*, Unpublished Working Paper, 2014.

¹⁷⁶ Riles, *supra* note 165.

the connecting factor for international transactions that courts and regulators apply unknowingly might make arbitration more costly and more difficult.¹⁷⁷ The downside of a conflicts approach however is that – against all intuition! – the body of law known in Europe as “private international law” is in fact *national* law. This has two implications. First, there is – and, absent international harmonization – will always be, diverging conflict of laws standards across countries. So courts and regulators will come to different conclusions on how to deal with a behavior that seemingly presents evasive arbitration. Secondly, this means that an “offshore” jurisdiction, which attempts to attract business in the way we saw above¹⁷⁸, will be able to safeguard this approach by backing up attractive law substantive law standards with a corresponding conflicts rule. Provided that subsequent litigation is being brought before their courts, arbitrageurs will thus be able to successfully engage in arbitration after all – and irrespective of whether the country arguably deprived of its business changes its own conflicts rules. The bottom line is that a viable conflicts approach would therefore require an international agreement to be operational in reducing regulatory arbitration—albeit on a lower level, only harmonizing rules of private international law.¹⁷⁹

One final line of thought to overcome the problems of harmonization can be described as a “functional approach” to financial regulation. At the heart of this idea is the belief that discretion or flexibility for regulators will ameliorate some of the downsides of harmonization efforts. To illustrate, consider the consequences of a world where global standards are being adopted, and where banking regulation becomes more stringent once again. Such detailed rulemaking has been described as the “meat and drink of regulatory arbitration”.¹⁸⁰ Rigid and complex rule-making will inevitably contain a number of gaps, which will then easily be exploited by the regulatees; it might even be understood to legitimize the non-specified behavior. Hence the calls for more discretion in regulatory standards, for more flexibility in addressing the regulatory concerns.¹⁸¹ Rather than micro-managing an ever-changing financial market, it may be more effective to tie the regulation to the financial

¹⁷⁷ Riles, *supra* note 165, at p. 97-98.

¹⁷⁸ See *supra* section II.B.

¹⁷⁹ Professor Riles admits this point indirectly: see *ibid.*, at p. 119: “Many of the problems of the moment [...] implicate larger questions of the proper allocation of regulatory authority between regulatory systems. Without agreement about such questions of scope based on principled legal theory, international financial governance will disintegrate in times of crisis (and will slowly erode even in ordinary times) into haphazard national assertions of individual authority. Beginning from the resolution of disagreements over questions of scope (such as the extraterritorial reach of domestic securities laws), rather than from the harmonization of substantive rules (such as capital adequacy requirements), places a premium on coordination from the standpoint of respect and preservation of regulatory diversity, and hence holds out the promise of building an international financial governance architecture that is strong and resilient.”

¹⁸⁰ Paul Tucker, *Bank regulators need strong principles and firm rules*, FIN. TIMES, June 19, 2014.

¹⁸¹ See, e.g., Steven L. Schwarcz, *Regulating Financial Change: A Functional Approach*, Working Paper 2014, available at <<http://ssrn.com/abstract=2469467>>.

system's functions, which are less time-dependent than any specific financial architecture.

C. Extraterritoriality as a real-life response

A more realistic (and natural) reaction to the problem of international diversity is the attempt by lawmakers to achieve an extraterritorial reach of their laws.¹⁸² Thus, where regulators are not able to convince their foreign counterparts to enter into a mutual agreement, harmonize laws or reach convergence, they might attempt to push through their concepts by way of unilateral action.¹⁸³ There are numerous examples for such behavior. The most well-known context of extraterritorial application has long been antitrust law, where regulators assume jurisdiction to assess the validity of worldwide cartels or mergers that may have an “effect” on the domestic market. In the field of securities law, we have seen extraterritorial action until very recently with the enforcement of U.S. securities laws to foreign issuers by way of the famous “f-cubed” class actions. These are lawsuits where a foreign investor who bought their shares in foreign-domiciled companies on foreign exchanges initiated litigation for violations of U.S. securities laws. They had been accepted by American courts for a long time, only to be seriously restricted by a landmark case in 2010.¹⁸⁴ In the field of financial markets, a number of regulators have initiated extraterritorial efforts in the wake of the global financial crisis. One example is the regulation of OTC derivatives trades, where both U.S. and E.U. regulators sought to extend domestic clearing and settlement requirements to international situations through a far-reaching interpretation of domestic rules.¹⁸⁵ Another field of application is the regulatory

¹⁸² On this approach, see John C. Coffee, Jr., *Extraterritorial Financial Regulation: Why E.T. Can't Come Home*, 99 CORNELL L. REV. 1259, 1268 (2014); Christian Johnson, *Regulatory Arbitrage, Extraterritorial Jurisdiction, and Dodd-Frank: The Implications of US Global OTC Derivative Regulation*, 14 NEV. L.J. 542 (2014); Edward F. Greene & Ilona Potiha, *Issues in the Extraterritorial Application of Dodd-Frank's Derivatives and Clearing Rules, the Impact on Global Markets and the Inevitability of Cross-Border and US Domestic Coordination*, 8 CAP. MARKETS L. J. 338 (2013).

¹⁸³ For a theoretical framework, see Jonathan R. Macey, *Regulatory Globalization as a Response to Regulatory Competition*, 52 EMORY L.J. 1353 (2003).

¹⁸⁴ *Morrison v. National Australia Bank Ltd.* 561 U.S. 247 (2010).

¹⁸⁵ CFTC, *Interpretive Guidance and Policy Statement Regarding Compliance With Certain Swap Regulations*, 78 FED. REG. 45292 (July 26, 2013). See, on the various CFTC efforts in this context, Griffith, *supra* note 151, at p. 1329 ff.; Coffee, *supra* note 182, at p. 1277 ff.; Johnson, *supra* note 182, at p. 586 ff. For the EU, see COMMISSION DELEGATED REGULATION (EU) No 285/2014 OF 13 FEBRUARY 2014 supplementing Regulation (EU) No 648/2012 of the European Parliament and of the Council with regard to regulatory technical standards on direct, substantial and foreseeable effect of contracts within the Union and to prevent the evasion of rules and obligations, [2014] OJ L85/1. See on this Joanne Scott, *The new EU “extraterritoriality”*, 51 COMMON MARKET L. REV. 1343, at p. 1357 ff. (2014); Niamh Moloney, *Resetting the Location of Regulatory and Supervisory Control over EU Financial Markets: Lessons From Five Years On*, 62 INT'L. & COMP. L. Q. 955, 961 (2013); Olivia Ralevski, *The Extraterrestrial nature of the Extraterritoriality rules*, October 16, 2014, available at <<http://www.drslp.com/blog/extraterrestrial-nature-extraterritoriality->

policy known as bank “ring-fencing”, where regulation prescribes the separation of certain banking activities from others. The most well-known examples are the U.S. “Volcker rule”,¹⁸⁶ the proposals by the U.K. Vickers Commission,¹⁸⁷ and the recommendations by the E.U. High Level Group chaired by Erkki Liikanen.¹⁸⁸ Limiting such regulation to only domestic institutions would fall short of having an impact on all banking activity that takes place in any given jurisdiction, as many foreign banks act across borders. All of these regulatory proposals therefore face the difficulty of specifying how they apply to “foreign” banks, and how far they need to expand the scope of application. Thereby, regulatory implementation of these concepts has asserted, or proposes to assert, extraterritorial reach subjecting certain foreign institutions to their domestic rules.¹⁸⁹ The final example is the current debate around imposing an E.U. “financial transaction tax” (FTT), with the objective to recoup monies from the financial sector and to curb volatility of the financial markets.¹⁹⁰ Since one of the main points of criticism has been that the introduction of such a levy would invite easy arbitrage possibilities, E.U. lawmakers are currently devising various ways to impose the tax beyond their own borders.¹⁹¹

rules/?utm_source=rss&utm_medium=rss&utm_campaign=extraterrestrial-nature-extraterritoriality-rules>.

¹⁸⁶ The so-called Volcker Rule is part of the Dodd-Frank Act that broadly prohibits “banking entities” from “engaging in proprietary trading” or “acquiring or retaining any equity, partnership, or other ownership interest in or sponsoring a hedge fund or private equity fund,” subject to a number of exceptions. See Dodd-Frank Act § 619 (2010). This provision adds a new section 13 to the Bank Holding Company Act of 1956, 12 U.S.C. § 1841 f. The provision will be codified at 12 U.S.C. § 1851. The quoted language in the text is in section 13(a)(1)(A) and (B).

¹⁸⁷ The Independent Commission on Banking, chaired by Sir John Vickers, produced its final report in 2011, suggesting inter alia that UK banks should “ring-fence” their retail banking divisions from their investment banking arms to safeguard against riskier banking activities. It laid the ground for the FINANCIAL SERVICES (BANKING REFORM) ACT 2013, c. 33.

¹⁸⁸ High-level Expert Group on reforming the structure of the EU banking sector, chaired by Erkki Liikanen, FINAL REPORT, Brussels, October 2012, available at <http://ec.europa.eu/internal_market/bank/docs/high-level_expert_group/report_en.pdf>. Follow-up legislative activity is still in the making, see European Commission, 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, January 29, 2014.

¹⁸⁹ Coffee, *supra* note 182, at p. 1277 ff. See also David R. Sahr, *Does Volcker + Vickers = Liikanen?*, HARVARD LAW SCHOOL FORUM ON CORPORATE GOVERNANCE AND FINANCIAL REGULATION, March 8, 2014, available at <<http://blogs.law.harvard.edu/corpgov/2014/03/08/does-volcker-vickers-liikanen/>>.

¹⁹⁰ On this debate, see in particular Joachim Englisch, John Vella & Anzhela Yevgenyeva, *The Financial Transaction Tax Proposal Under the Enhanced Cooperation Procedure: Legal and Practical Considerations*, 2013 BRITISH TAX REV. 223 (2013); John Vella, Clemens Fuest & Tim Schmidt-Eisenlohr, *The EU Commission’s Proposal for a Financial Transaction Tax*, 2011 BRITISH TAX REV. 607 (2011).

¹⁹¹ Under the current proposal, financial transactions in structured products or financial instruments issued within a participating Member State are subject to the tax even if they are carried out between parties who are not established in a participating Member State. See COMMISSION PROPOSAL FOR A COUNCIL DIRECTIVE IMPLEMENTING ENHANCED COOPERATION IN THE AREA OF FINANCIAL TRANSACTION TAX, COM(2013) 71 final, February 14, 2013, Article 4(1)(g).

The approach to expand the scope of legislation extraterritorially appears plausible from a political viewpoint: policy makers seek to close loopholes and curb arbitrage outright. The obvious risk is a clash with principles of public international law and the comity of nations.¹⁹² The regular consequence is that there will be serious problems to enforce such extraterritorial standards—in particular, when the exercise of public authority abroad is involved. But extraterritorial rules do not only clash with an international comity ideal, they also ignore the opportunity to achieve regulatory goals through policies of equivalence and mutual recognition, and they increase the potential for conflicting or duplicative regulatory policies.¹⁹³ This can lead to increased compliance costs that reduce market liquidity and subject market participants to operational and legal risks tied to conflicting domestic and foreign policies.

Substituted compliance of regulatory requirements with foreign equivalences may re-emerge as a concept, addressing some of the perceived weaknesses of extraterritoriality.¹⁹⁴

D. First mover advantage and race to the top

Finally, regulators have occasionally attempted to deliberately disregard (or ignore) arbitrage opportunities in recent reforms. Facing the abyss of a financial meltdown, policy makers in both the U.K. and the U.S. have imposed tough new regulatory regimes—despite threats by the financial sector to circumvent them or to relocate abroad.

It appears that such regulatory initiatives are motivated by a strategy known as the “first mover advantage”. Regulators hope to be the first to formulate a standard which is later exported to other jurisdictions and thus becomes a de facto best practice standard on a global or regional level. To illustrate, consider the “ring-fencing” reforms to banking structure implemented in the U.K., as discussed above. Lawmakers were aware at the time that the U.K. would be comparatively strict, and that such a move would be costly for the financial sector. Banks constantly lobbied for changes to the proposed system, and relocation threats were on the daily agenda. And yet, lawmakers even upgraded the original proposals made by the Vickers

¹⁹² See the analysis by Englisch, Vella & Yevgenyeva, *supra* note 190, at p. 236 ff.

¹⁹³ Chris Brummer, *Territoriality as a Regulatory Technique: Notes from the Financial Crisis*, 79 U. CIN. L. REV. 499, 509 ff (2011); Lucia Quaglia, *The Politics of Third Country Equivalence in Post-Crisis Financial Services Regulation in the European Union*, 38 West European Politics 167, 170 ff (2015).

¹⁹⁴ By way of background, see Ethiopis Tafara & Robert J. Peterson, *A Blueprint for Cross-Border Access to U.S. Investors: A New International Framework*, 48 HARV. INT’L. L. J. 31, 53 ff (2007). For a more recent re-assessment, see Howell E. Jackson, *Substituted Compliance: The Emergence, Challenges, and Evolution of a New Regulatory Paradigm*, 1 J. FIN. REG. (forthcoming, 2015); Alexey Artamonov, *Cross-Border Application of OTC Derivatives Rules: Revisiting the Substituted Compliance Approach*, 1 J. FIN. REG. (forthcoming, 2015).

Commission in a way that would sharpen (“electrify”) the ring fence, thus in the face of arbitrage threats, they insisted on the necessity of tough and unpopular legal rules. This bold move was later rewarded: relocation threats did not materialize and, more importantly, others have followed suit: neighboring France and Germany both adopted a similar version of such reforms, and even the E.U. has come up with its own proposals to banking structure: the Liikanen Group recommended similar (if yet conceptually different) rules for the entire European banking sector, and the European Commission has recently published a draft legislation to implement this.¹⁹⁵ Thus, it appears that the first move made by lawmakers in Britain had a twofold purpose: to formulate standards which would make banking safer and which would be essential in a country that so heavily depended on financial services as the U.K. Secondly, however, the purpose will have been to impress other jurisdictions—both horizontal competitors, such as other E.U. Member States, and a vertical competitor, namely the federal E.U. level. If these assumptions are only partially true, we do observe a real version of a “race to the top”, since other regulators are following the best practices developed by a leading jurisdiction.

Another, current example are the proposed U.K. rules on personal accountability of bankers. Several jurisdictions have sought to strengthen legal rules on personal responsibility of those who take big financial decisions. However few seek to go as far as the U.K. Britain’s two new regulators, the Prudential Regulation Authority (PRA) and the Financial Conduct Authority (FCA) recently issued joint draft proposals that would make it easier for regulators to sanction senior bank managers if their conduct – or that of those beneath them – fell below the standards expected.¹⁹⁶ At the same time, the two regulators also proposed changes to the remuneration system of banks, better aligning risk and reward over the longer term.¹⁹⁷ Predictably, these proposals prompted a backlash from bankers concerned. Financial lobbyists have warned that the proposed regime gives Britain far tougher rules than other financial centers and that this could lead to an exodus of talent. Lawmakers were thus aware of this risk.¹⁹⁸ And yet, this argument does not appear to have influenced

¹⁹⁵ European Commission, *supra* note 188.

¹⁹⁶ Prudential Regulation Authority and Financial Conduct Authority, CONSULTATION PAPER – STRENGTHENING ACCOUNTABILITY IN BANKING: A NEW REGULATORY FRAMEWORK FOR INDIVIDUALS (FCA CP14/13/PRA CP14/14), July 2014, available at <<http://www.fca.org.uk/static/documents/consultation-papers/cp14-13.pdf>>. This is based, in turn, on recommendations by the Parliamentary Commission on Banking Standards.

¹⁹⁷ Prudential Regulation Authority and Financial Conduct Authority, CONSULTATION PAPER – STRENGTHENING THE ALIGNMENT OF RISK AND REWARD: NEW REMUNERATION RULES (PRA CP15/14/FCA CP14/14), July 2014, available at <<http://www.fca.org.uk/static/documents/consultation-papers/cp14-14.pdf>>.

¹⁹⁸ Europe Economics, COST BENEFIT ANALYSIS OF THE NEW REGIME FOR INDIVIDUAL ACCOUNTABILITY AND REMUNERATION – FINAL REPORT (July 2014), available at <<http://www.bankofengland.co.uk/prd/Documents/publications/cp/2014/cp1414annex10.pdf>>. “Large banks and investment firms, who are more exposed to international labour markets, are likely to be at a

decision-making. As the Financial Time puts it, “After a crisis in which the taxpayer bailed out the banks to the tune of many billions, the authorities cannot allow financial regulation to be guided by considerations of trade promotion. The public interest, not private profit, is what the rules should protect.”¹⁹⁹

This noble practice seems to be operational only under certain conditions, however. The U.K. banking structure framework and personal liability rules were only adopted because the threat to a financial meltdown was great enough – had there been a crisis on a lower scale, it is doubtful whether politicians would have responded in a similar, extreme way. Secondly, the successful export of these rules to other shores crucially depends on the relative size and the importance of the first mover.²⁰⁰ Put differently, since the City of London is one of the leading financial centers globally, it has the clout to impose tough standards—which lower-ranked jurisdictions could not afford to consider. If either of these two criteria is not fulfilled, a first move to implement tough regulation risks being counterproductive.

V. THE ROLE OF SPECIAL RESOLUTION REGIMES

So far, this paper has considered the merits of regulatory arbitrage and competition in the regulation of global financial markets. The assessment so far has been ambiguous. There are certainly merits in the discovery process generated by different competing rule-makers, but the risk such competition poses to common systemic stability has become obvious.²⁰¹ In the following, this section introduces a new regulatory tool to the debate: special resolution regimes for financial institutions are an innovative element of post-crisis financial regulation discourse. Their role in addressing the problems caused by regulatory competition has been underexplored to date. I argue that an effective global system for the resolution of systemically relevant financial institutions holds great promise to curb negative externalities produced by arbitrage and regulatory competition, while potentially preserving their dynamic benefits.

significant competitive disadvantage *vis-a-vis* non-UK based firms. This may further affect the competitive position of the City as a global financial centre in the long term.” *ibid.*, at p. 4.

¹⁹⁹ Financial Times Comment, *Hold Britain’s banks to higher standards: New rules on personal accountability are tough but necessary*, FIN. TIMES, October 9, 2014, at p. 12.

²⁰⁰ Cf. Griffith, *supra* note 151, at p. 1368-9 (on a comparable “first move” by the U.S. CFTC): “While it is true that the U.S., because it does not act alone in dictating world financial policy, cannot act alone in granting nations leave to depart from international norms, it is also true that the enormous importance of its financial markets gives the U.S. a leading role to play in designing and implementing global regulatory policy, a role the CFTC has already assumed in the area of swaps regulation.”

²⁰¹ See *supra* section III.C.i.

A. The attractiveness of a resolution regime

Ever since the initial wave of state interventions in fall 2008, academics, regulators and policy-makers have deplored the lack of alternatives to the bail-out programs, pressing for the adoption of restructuring tools that could “resolve” a large failing bank or other financial institution without wreaking havoc across the financial sector. It is thus important to state the importance of “resolution,” as opposed to the “bankruptcy” or “insolvency” alternative for banks and other financial institutions.²⁰² “Bankruptcy” entails a court-supervised process that is designed to protect the substantive and procedural rights of all creditors without particular regard for broader public interests. This includes the immediate cessation of payments to any particular class of creditors (e.g., depositors or other short term funders). It triggers default provisions in various counterparty credit agreements that may permit the seizing of collateral and the termination of relationships. It will bring an abrupt halt to the trading in financial claims that is the life’s blood of a financial firm. Because of the nature of financial assets and relationships in the financial sector, in the absence of immediate “debtor-in-possession” financing that would keep the firm afloat and guarantee its undertakings while a reorganization was negotiated, bankruptcy intervention will produce severe erosion in the franchise value of a failed financial firm and will deepen the losses for creditors. The financial sector conditions that produce the bankruptcy of a large firm also make it unlikely that other financial institutions could provide such large-scale financing and guarantees; instead, they will hoard liquidity. The consequence of bankruptcy then is likely to be “disorderly liquidation,” meaning the disposition of assets at fire-sale valuations and a value-destructive disassembly of the firm’s business.²⁰³ If the firm is systemically important, particularly if the firm is highly interconnected with other financial firms, the abrupt cessation of counterparty relationships, the expectation of large losses, and the gyrations in asset values will likely produce widespread systemic distress, which will magnify the losses that would otherwise occur.²⁰⁴ This, in turn, was the reason for the need to rescue such financial institutions with taxpayers’ money: the famous “too big to fail” problem.

²⁰² On the difference, see David A. Skeel, Jr., *Single Point of Entry and the Bankruptcy Alternative*, in *ACROSS THE GREAT DIVIDE: NEW PERSPECTIVES ON THE FINANCIAL CRISIS* 311 (Martin Neil Bailly & John B. Taylor, eds., 2014).

²⁰³ The value loss includes significant social value, not just private value, because the assets commonly end up in the hands of parties who are not best positioned to maximize their value. For example, a loan officer with knowledge of the borrowers will be better positioned to manage the credit relationships than a hedge fund manager who has purchased a loan book. See Andrei Shleifer & Robert W. Vishny, *Fire Sales in Finance and Macroeconomics*, 25 *J. ECON. PERSP.* 29 (2011) (surveying economics literature).

²⁰⁴ Heidi M. Schooner & Michael W. Taylor, *GLOBAL BANK REGULATION: PRINCIPLES AND POLICIES* 243 (Elsevier, 2010).

By contrast, “resolution” is an administrative process in which the goal is to protect the liquidity needs of short-term creditors, especially depositors, and to manage financial assets in a way that preserves their value and the franchise value of the failing institution.²⁰⁵ A major objective of resolution is to avoid systemic distress in the financial sector, a social good that may not be coincident with the private objective of protecting the equal treatment or absolute priority of creditor claims.²⁰⁶ Resolution authorities are thus equipped with far-reaching powers to defuse the systemic risk of a failing institution, including unprecedented powers to override property rights of private market participants.²⁰⁷ One critical element of resolution is the capacity of the administrator to offer liquidity to maintain the critical functions of the financial institution. This is operationally equivalent to debtor-in-possession financing but has the advantage of assured availability in sufficient amount at a time of systemic distress. In comparing resolution with the outcome of regular bankruptcy, the Federal Deposit Insurance Corporation (FDIC) projected that in the case of Lehman Brothers, a resolution would have produced losses of only 3 cents on the dollar versus bankruptcy losses of 79 cents on the dollar.²⁰⁸ In short, the major losses in the failure of a large financial institution will derive from disorderly failure; these losses can be avoided through an effective resolution process.

Against this backdrop, it is no surprise that the concept of bank resolution has been an unequalled success story in many major economies over the past few years. The U.S. was one of the first countries to introduce such a special resolution regime. Title II of the Dodd-Frank Act granted new powers to the FDIC for orderly resolution of systemically important financial institutions (“Orderly Liquidation Authority”, “OLA”); in turn, the FDIC has devised an approach that may address cross-border problems as well. In Europe, activity initially took place on the national level: Most prominently, the U.K. and Germany each introduced separate national bank resolution powers for their regulators.²⁰⁹ After an extended period of deliberation, the E.U.

²⁰⁵ John Armour, *Making Bank Resolution Credible*, in OXFORD HANDBOOK OF FINANCIAL REGULATION (Eilís Ferran, Niamh Moloney & Jennifer Payne, eds., forthcoming 2016).

²⁰⁶ See Randall Guynn, *Are Bailouts Inevitable?*, 29 Yale J. Reg. 121 (2012). Compare Kenneth E. Scott & John B. Taylor, eds., BANKRUPTCY NOT BAILOUT: A SPECIAL CHAPTER 14 (2012).

²⁰⁷ Basel Committee on Banking Supervision, REPORT AND RECOMMENDATIONS OF THE CROSS-BORDER BANK RESOLUTION GROUP (March 2010), available at <<http://www.bis.org/publ/bcbs169.pdf>>.

²⁰⁸ See FDIC Press Release describing the Lehman OLA report, <<http://www.fdic.gov/news/news/press/2011/pr11076.html>>. For a detailed analysis of the Lehman Bankruptcy, see Michael Fleming & Asani Sarkar, *The Failure Resolution of Lehman Brothers*, 20(2) FRBNY ECON. POLICY REV. 175 (2014), available at <<http://www.ny.frb.org/research/epr/2014/1412flem.pdf>>.

²⁰⁹ Initially adopting emergency legislation, the U.K. moved to a more permanent rescue mechanism through the Banking Act 2009. On the Banking Act, see in detail P Brierley, *The UK Special Resolution Regime for Failing Banks in an International Context*, BANK OF ENGLAND FINANCIAL STABILITY PAPER NO 5 (July 2009) 4; Emiliós Avgouleas, *Banking supervision and the special resolution regime of the Banking Act 2009: the unfinished reform*, 4 CAPITAL MARKETS LAW JOURNAL 201 (2009); Kern Alexander, *Bank Resolution Regimes: Balancing Prudential Regulation and*

joined in and at first agreed a common instrument for recovery and resolution of banks, effectively harmonizing the (*national*) resolution powers across E.U. Member States (“E.U. Bank Recovery and Resolution Directive”, “BRRD”).²¹⁰ The BRRD introduced mandatory standards for all existing resolution mechanism throughout the E.U. Member States, but left resolution authority and funding in the hands of the Member States. In parallel to these efforts, the E.U. Member States and institutions agreed in 2012 to create a Eurozone Banking Union.²¹¹ This plan has opened up an entirely new dimension for cross-border banking resolution, as the three pillars of the proposed Banking Union – joint supervision, resolution, and deposit insurance – created, in their second element, federal resolution powers to be wielded by a new E.U. resolution authority given access to a new federal rescue fund. Under this concept, E.U. institutions agreed on a centralized “Single Resolution Mechanism” (SRM) in 2014.²¹² Under its current design, the Banking Union is primarily a framework for the Eurozone countries, but is open for all other E.U. Member States to join. The key rationale for federalizing these powers is to ensure impartial decision-making on how to deal with failed banks on the European level, thus reducing any possibility of national forbearance or moral hazard, and to break the “fatal link” between sovereigns and their banks. Additionally, the aim is to better deal with cross-border bank failures.²¹³

Shareholder Rights, 9 J. CORP. L. STUD. 61, 90 ff. (2009). In Germany, the paradigm shift from the “rescue” phase to the “restructuring” phase was marked by the coming into force of the Restructuring Act on January 1, 2011 (Gesetz zur Restrukturierung und geordneten Abwicklung von Kreditinstituten, zur Errichtung eines Restrukturierungsfonds für Kreditinstitute und zur Verlängerung der Verjährungsfrist der aktienrechtlichen Organhaftung (Restrukturierungsgesetz) of December 9, 2010, BGBI I 2010, 1900.). Under the new regime, the German market supervisor BaFin received extended powers of intervention and special restructuring; further, reorganization instruments for German banks were introduced. For an overview of various policy responses until 2011, see Basel Committee on Banking Supervision, *Resolution policies and frameworks – progress so far*, July 2011, available at <<http://www.bis.org/publ/bcbs200.pdf>>.

²¹⁰ Directive 2014/59/EU of the European Parliament and of the Council of 15 May 2014 establishing a framework for the recovery and resolution of credit institutions and investment firms and amending Council Directive 82/891/EEC, and Directives 2001/24/EC, 2002/47/EC, 2004/25/EC, 2005/56/EC, 2007/36/EC, 2011/35/EU, 2012/30/EU and 2013/36/EU, and Regulations (EU) No 1093/2010 and (EU) No 648/2012, of the European Parliament and of the Council, [2014] OJ L173/190.

²¹¹ Council of the European Union, Summit conclusions of June 28/29, 2012, EUCO76/12.

²¹² Regulation (EU) No 806/2014 of the European Parliament and of the Council of 15 July 2014 establishing uniform rules and a uniform procedure for the resolution of credit institutions and certain investment firms in the framework of a Single Resolution Mechanism and a Single Resolution Fund and amending Regulation (EU) No 1093/2010, [2014] OJ L225/1. The SRM is accompanied by an Intergovernmental Agreement (IGA) between the Member States that specifically deals with the resolution fund. This IGA was signed on May 21, 2014, by 26 E.U. Member States (all but Sweden and the United Kingdom): AGREEMENT ON THE TRANSFER AND MUTUALISATION OF CONTRIBUTIONS TO THE SINGLE RESOLUTION FUND, Council Document 8457/14, available at <<http://register.consilium.europa.eu/doc/srv?l=EN&f=ST%208457%202014%20INIT>>.

²¹³ The collapse of Lehman Brothers U.K. after the failure of Lehman Brothers U.S. and the failure of Fortis Bank underscored the need to create cross-border resolution options. European Commission, Proposal for a Regulation of the European Parliament and of the Council establishing uniform rules and

B. How resolution can help manage regulatory competition

The power of a special resolution regime is not just a more refined way of dealing with failing banks. The approach also gives us important additional tools for responding to regulatory competition. We saw above that regulatory competition can exhibit both positive and negative effects, and that the main risk lies in the creation of negative externalities, most importantly to global financial stability. The basic argument is thus this: if an effective global resolution standard equips regulators with the necessary tools to deal with failing banks without disruption to the market, it can help mitigate the risks to financial stability that result from regulatory competition. In a world where the threat of a failing Systemically Important Financial Institution (Sifi) can be managed, implicit subsidies due to the institutions' systemic character will be a thing of the past. Market discipline will then resume its traditional place of dictating banks' commercial decisions much more than before, and the disastrous impact of overly deregulated financial products will lose its blackmailing power.

The belief in the power of resolution is founded on the premise that a credible resolution regime is key to the goal of (re-)introducing market discipline into banking. And indeed, research has demonstrated that the implementation of tough resolution powers generally succeeds in discouraging risk-taking by financial institutions.²¹⁴ Deprived of the implicit state guarantee to be rescued at all costs, the regular laws of the market can thus be reinstalled: if the financial institution enters into too great risks, it will fail.²¹⁵ For international, cross-border situations, the current hope is that regulators will agree on a common understanding, ideally based on a "single-point-of-entry" approach, effectively implementing the resolution process for an entire banking group only at the holding company level and saving operating subsidiaries.²¹⁶ It is possible that an international agreement is required for such a degree of mutual trust; and where the sovereign itself is too weak, we may need centralization of resolution powers as in the E.U. Banking Union. All of these activities are to be supported by

a uniform procedure for the resolution of credit institutions and certain investment firms in the framework of a Single Resolution Mechanism and a Single Bank Resolution Fund and amending Regulation (EU) No 1093/2010 of the European Parliament and of the Council, July 10, 2013, COM(2013) 520 final, at pp. 3-5. See also European Central Bank, *Opinion on the SRM Regulation*, November 6, 2013. Some can claim prescience in seeing urgency for new resolution regimes. See Robert R. Bliss, *Resolving Large Complex Financial Institutions*, in MARKET DISCIPLINE IN BANKING: THEORY AND EVIDENCE (George G. Kaufman, ed., Elsevier, Oxford: 2003), at p. 3.

²¹⁴ Magdalena Ignatowski & Josef Korte, *Wishful thinking or effective threat? Tightening bank resolution regimes and bank risk-taking*, 15 J. FIN. STABILITY 264 (2014); Gara Afonso, João Santos & James Traina, *Do "Too-Big-to-Fail" Banks Take On More Risk?*, 20 ECON. POLICY REV. March 2014, available at <<http://libertystreeteconomics.newyorkfed.org/2014/03/do-too-big-to-fail-banks-take-on-more-risk.html>>. See also U.S. Government Accountability Office, *Large Bank Holding Companies—Expectations of Government Support*, GAO-14-621 (July 2014).

²¹⁵ Martin Čihák & Erlend Nier, *The Need For Special Resolution Regimes For Financial Institutions—The Case Of The European Union*, 2 HARV. BUS. L. REV. 395 (2012).

²¹⁶ See in more detail, Jeffrey N. Gordon & Wolf-Georg Ringe, *Bank Resolution in the European Banking Union: A Transatlantic Perspective on What It Would Take*, 115 COLUM. L. REV. 1297 (2015).

ancillary measures such as stress tests, the requirement of providing of living wills and other recovery measures.

The advantage of such a system is obvious: a financial institution, lured by arbitrage or by lax oversight, has entered into irresponsible risks and gets into difficulties. It will not pose a threat to global financial stability any more where robust resolution powers are readily available. The host jurisdiction of the financial group will be able to take the institution down – without affecting global financial stability. It is understandable that resolution has therefore been hailed as the most important post-crisis piece of the puzzle to end “too big to fail”.²¹⁷ Even if claims that resolution would be the “only” tool that would be required are certainly exaggerated, there is some grain of truth in a regulatory perspective that focusses less on the solvent life of a financial institution—but bundles regulatory efforts for its crisis stage or a failure situation.²¹⁸

To illustrate, consider one of the examples described above.²¹⁹ We have seen that the Dodd-Frank reform of OTC derivative trading sparks fears that financial institutions may engage in regulatory arbitrage by simply making their trades on other markets that are less costly than the American requirements, but also potentially less safe. Suppose now that a U.S. financial institution gets into financial difficulty as a consequence of such dealings: the operation of the U.S. resolution powers under OLA implemented by the Dodd-Frank-Act will be able to take the institution down and eliminate its threat to global stability. The attention then shifts back to the regular checks and balances that corporate governance and product markets have to offer.

Ideally, such a resolution framework would operate globally. In other words, key jurisdictions would commit to mutually respect, support and accept as equivalent resolution action from each other. This probably requires some type of a formal international agreement.²²⁰ Where such a credible global system for resolution is in place, regulatory competition could then operate within its boundaries: a global level playing field with clear competences for winding down a failing bank could thus

²¹⁷ For example, Urs Rohner, Credit Suisse Chairman, said in an interview: “There is still no fully implemented standard around the world for the orderly restructuring or resolution of an international, systemically important bank. I said five years ago that this is the ultimate litmus test for the system’s stability. It must be possible to remove such banks from the system without the system itself experiencing problems.” See *The Future of Banks*, BULLETIN no 5/2013, p. 22, at p. 26.

²¹⁸ See, e.g., Marcelo M. Prates, *Why Prudential Regulation Will Fail to Prevent Financial Crises: A Legal Approach*, CENTRAL BANK OF BRAZIL WORKING PAPER NO. 335 (2013), available at <<http://ssrn.com/abstract=2375470>>.

²¹⁹ See *supra* section III.A.

²²⁰ The U.S. and the U.K. have already reached consensus on a common approach to resolution. See FDIC & Bank of England, *RESOLVING GLOBALLY ACTIVE, SYSTEMICALLY IMPORTANT, FINANCIAL INSTITUTIONS* (December 10, 2012), available at <<http://www.fdic.gov/about/srac/2012/gsifi.pdf>>. However, some doubts remain on how reliable this agreement is. In favor of an international agreement: Lex, *Bank resolution: marriage before divorce*, FIN. TIMES, Jan. 2, 2015.

contribute as a framework for a global market place in regulatory efforts.²²¹ It is in this spirit that first regulators have hinted at the possibility to be more welcoming to inter-jurisdictional competition once a reliable resolution framework is in place.²²² In a recent report, a working group at the Bank for International Settlements (BIS) developed a similar vision of competition both in the banking sector and between regulators, but coupled with strong resolution powers as a complementary and important component.²²³

C. Further qualifications

An approach highlighting the case for bank resolution would have an additional advantage. The focus of resolution regimes has been to focus on those financial institutions that are *systemically significant*. The implication would be that it does not intervene in situations where the actors on global financial markets do not pose a risk for global financial stability.

That appears desirable. Regulatory arbitrage and competition do not seem equally problematic in fields beyond systemically relevant institutions. Put differently, arbitrage and regulatory competition may revert to their advantageous core where the activity at stake does not involve stability concerns.

An example would be risky activities by non-banks: hedge funds, for example, have dramatically increased their volume of proprietary trading—largely, as a consequence of limitations imposed by Dodd-Frank on traditional banks;²²⁴ insurance

²²¹ The framework is reminiscent, although in a different context, of an ordoliberal approach. Ordoliberal theory holds that the State must create a safe legal environment for the economy, define the rules of the game and maintain a level of competition through measures that adhere to market principles. This is the foundation of its legitimacy.

²²² Prates, *supra* note 218; see also Rohner, *supra* note 217.

²²³ BIS, Committee on the Global Financial System, CGFS Paper No 41 (2010), LONG-TERM ISSUES IN INTERNATIONAL BANKING, at p. 31: “Given its strong role in shaping international intermediation in the past, regulation has an important role to play in fostering cross-border knowledge transfer. The end result, however, should not be the convergence to a single risk assessment or risk management framework, which would encourage herd behaviour and weaken financial stability. Since any given framework is inevitably imperfect, diversity of approaches would carry large benefits. Perhaps even more importantly, a new regulatory framework should aim at a level playing field. Competition is a major channel through which international banks promote growth. [...] At the same time, competition may have contributed to the underpricing of risk and, thus, to a leverage-based expansion of balance sheets in the run-up to the crisis. There is scant evidence for economies of scale within large internationally active banks. However, certain banks may have expanded, either domestically or internationally, with the aim of attaining a too-big-to-fail status. Such a status increases moral hazard and weakens market monitoring of risk-taking, which benefits individual firms but distorts economic incentives and renders the financial system more fragile. [...] Effective, and therefore credible, bank resolution regimes that take into account the too-big-to-fail issue would be a welcome complement”.

²²⁴ Dan Wilchins, *Proprietary traders may find hedge fund life harder*, REUTERS, August 5, 2010, available at <<http://www.reuters.com/article/2010/08/05/us-financial-protrading-analysis-idUSTRE6745WO20100805>>.

companies have started lending.²²⁵ As long as they are not systemically relevant—which they usually are not—we should not be concerned with this move. Hedge funds have always had a significant failure rate; failure is an accepted and understandable part of the process of speculative investments, and their investors are sophisticated. Their failure will—different from banks—normally not exhibit the same systemic consequences as a failure of a Sifi.²²⁶

The focus of resolution regimes on systemic risk is therefore an important component of their functionality in addressing regulatory arbitrage. As this paper has argued, the single most important problem of regulatory arbitrage in financial markets is the potential risk to financial stability.²²⁷ Resolution would therefore be an accurately fitting regulatory response to the phenomenon.

D. Limitations of a resolution-based approach

Resolution as a concept to address regulatory arbitrage and regulatory competition does not purport to solve the problem entirely. Its more modest role is to guarantee the reintroduction of market discipline to certain excessive risks that can and should be better judged by the market rather than by regulators. Investor protection might remain an issue in individual cases, to be addressed in other ways.

Resolution has its inherent limits, too. For example, it would be of limited value where a financial institution moves to a jurisdiction that does not have a resolution regime or does not enforce it.²²⁸ Where resolution itself is lax, market discipline would not materialize: resolution itself would then become subject to regulatory competition in the style of “resolution shopping”. As we saw above, however, regulatory arbitrage in financial markets mostly occurs in the form of shifting trades and deals to foreign jurisdictions within the same group, or by setting up or acquiring foreign subsidiaries.²²⁹ This means that resolution will remain useful to the lion share of the problem. Where trades and businesses are shifted to foreign subsidiaries of a large banking group, or where these entities are been set up, the potential commercial risk stays within the same group; and the home state resolution authority, under the single-point-of-entry approach, will be able to extend its powers to the entire group and take it down in an orderly manner. In the above example,²³⁰

²²⁵ Centre for Economics and Business Research (Cebr) & DLA Piper, *SEARCHING FOR INVESTMENT: INSURERS AS LENDERS* (October 2012), available at <http://www.dlapipercentralcms.com/export/system/central-cms/publications/files/2012/insurance-and-reinsurance/Insurers_as_lenders_report.pdf>.

²²⁶ The only exception probably was the famous failure by Long-Term Capital Management (LTCM) in 1998, which required a government bailout.

²²⁷ See *supra* section III.C.

²²⁸ Ultimately, the system would rely on trust between jurisdictions to offer a sufficiently robust resolution mechanism in times of crisis.

²²⁹ See *supra* section III.A.

²³⁰ See *supra* section V.B.

the FDIC would be able to apply its powers under Dodd Frank Title II to any banking group that comes into trouble due to irresponsible derivatives trading.

To be sure, it would nevertheless be desirable that that the community of developed financial centers commit mutually by virtue of an international legal framework.²³¹ This would include the mutual acceptance of resolution activity, ideally based on a single-point-of-entry approach. Towards jurisdictions that do not offer an equivalent standard of resolution, however, and that thus threaten to undermine the common level playing field reached among them, the group could then refuse to cooperate: essentially, they could threaten to apply their own resolution powers towards financial institutions that relocate to or incorporate in such outside jurisdictions.

VI. CONCLUSION

The problem of regulatory competition and regulatory arbitrage in financial markets continues to preoccupy regulators worldwide. We have seen that both arbitrage and competition are both a reality in today's global financial markets, and that the financial sector is different from their traditional fields of application: the ease of arbitrage, the fragility of banking and the risks involved are exceptional. Most importantly, regulatory arbitrage does not or only rarely occurs by actually relocating the financial institution itself abroad: rather, banking groups tend to shift trading to foreign affiliates. I argue that the effects of regulatory competition can be ambivalent: its merits are a dynamic process of discovering new principles, rules and concepts that may lead to efficient outcomes and a mutual learning process. However, the downside is a threat to global financial stability where countries lower their standards to attract businesses, but impose externalities and undermine a global public good.

A successful regulatory strategy must thus address this latter problem while maintaining the beneficial effects and avoiding stifling harmonization. Regulators and academics have pursued or proposed a range of strategies to curb potentially negative externalities generated by regulatory competition. The natural reaction of promoting international coordination and harmonization is usually difficult to achieve and may be undesirable.

Instead, this paper introduces special resolution regimes for financial institutions into the discussion. I argue that, within limits, a credible, worldwide resolution standard can effectively contribute to addressing the problem. The main benefit would be to tackle the problem of financial stability caused by systemically

²³¹ See already *supra* section V.B. Note that the U.S. and the U.K. have already reached consensus on a common approach to resolution. See FDIC & Bank of England, RESOLVING GLOBALLY ACTIVE, SYSTEMICALLY IMPORTANT, FINANCIAL INSTITUTIONS (December 10, 2012), available at <<http://www.fdic.gov/about/srac/2012/gsifi.pdf>>.

important financial institutions' excessive risk-taking. If such risk-taking would be judged by market discipline instead of posing a risk to global financial stability, the main downside of regulatory competition could be restrained. Within the boundaries of such a system, competition could then operate and contribute to a market-led design of financial regulation.