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Propertization: The Process by which Financial Corporate Power has Risen and Collapsed

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Abstract:

Elsewhere I argue that the legal concept of property was created in the image of money in the late Roman Republic. Since then, the division of property and contract has been an underlying structure of Western law. The paper argues that a main way of structuring financial corporate power, especially money market funds (MMFs), is a propertization of contractual claims. Propertization here means to grant property rights to shareholders who are almost reduced to functionless debenture holders and thus supposed to have only contractual claims. The paper argues that this propertization has led to the rise of financial corporate power, especially MMFs and their money-creation mechanism. The paper also explores how the propertization of MMF shares contributed to generating the financial crisis of 2008, and it ends by briefly discussing a possible MMF reform policy.

Key words: Property, propertization, finance, corporate power, money market funds, financial crisis, money, credit, contract, shares, repurchase agreements

Capital is, as Jonathan Nitzan and Shimshon Bichler (2009) argue, “a symbolic quantification of power, representing the organized power of dominant capital groups to reshape their society.” This paper argues that a crucial way of structuring the organized power of financial corporations is a propertization of contractual claims. This way of structuring power—the mixture of two disparate rights, property rights and contractual rights—has not been examined by scholars, even by scholars who argue that capital is a symbolic quantification of power. This paper aims at filling this missing and, by doing so, contributing to the theory of “capital as power.”

Property is a classical notion that social science has used to explain the essence of capitalism. For example, classical writers, such as Karl Marx and Max Weber, argued that the nature of the transition from feudalism to capitalism can be understood as the rise of absolute private property. However, this classical notion disappears in the literature on the global financial crisis of 2008 and on the evolution of financial corporations. This disappearance is unfortunate because it makes the writings of the classical writers no longer relevant to the current crisis and to the current financial corporate power.

Property and finance have been, this paper argues, strongly intertwined. Elsewhere I (Kim 2014b) argues that the concept of property was created in the image of money. This mirroring happened in the late Roman Republic, where the new concept of property was first settled at law and money became a predominant medium for social relations. In modern times, the situation has become the other way around. Modern money is created, as I (Kim 2014b) elsewhere argues, when credit becomes a money-like instrument by mirroring the image of property, that is, when property rights are granted to creditors. I call this granting the *propertization* of contractual claims. That money-creation mechanism differs from that of previous money economy. Previous money economies could extend the money supply only by mining precious metals or debasing coinage. In modern times, by contrast, by granting creditors property rights, credit can be transformed to money.

Recently, some scholars use the term *propertization* to describe a social phenomenon wherein what is originally not property becomes property. This term is most often used for common natural resources or intellectual abilities such as ideas and knowledge. These resources and abilities are originally not property but should be commonly available to everybody according to the social rules of distribution. But when someone is granted exclusive rights over the use, disposal, and transfer of the resources and abilities, they become property. This is called *propertization*. The term *propertization* is used in this paper in a similar sense: what is not originally property becomes property. However, its use here has a difference. The *propertization* of contractual claims does not totally change contracts into property but makes them Janus-faced hybrids of the two legal rights (property and contractual rights) that constantly change their faces to enjoy the benefits and reduce the costs of both rights.

Scholars also use the term *commodification* to describe a social phenomenon wherein what is originally not produced to be sold becomes a commodity. The theory of capital as power also considers the concept of *commodification* seriously and argue that “without *commodification*, there can be no capitalization” (Nitzan and Bichler 2009, p. 307). It is true that without market where capitalist power is *commodified*, there would be no capital. But this *commodification* is only one aspect of capital: Nitzan and Bichler (2009, p. 18, my italics) still say that “capitalist power is *commodified, structured and restructured.*” Still it should be

explained not only that how capitalist power is commodified but also that how it is structured and restructured. I believe that the concept of propertization contributes to the latter explanation.

I elsewhere (Kim 2011) examined how modern banking and its money-creation mechanism originated in the late seventeenth century in England. To do so, I used the legal term *trusts* instead of *propertization*. But these two terms imply the same process through which creditors are granted property rights, thereby transforming their credit into money. In this paper I extend this previous research of mine to explain how the propertization of contractual claims has contributed to the rising and structuring of corporate power, especially money market funds (hereafter, MMFs) and their money-creation mechanism. Shareholders in the present form of business corporations, including MMFs, are almost reduced to functionless debenture holders with limited responsibility. That is, their rights and responsibilities are those of creditors in their economic substance. Nonetheless, the law grants them the opposite, property rights. This granting is a “propertization.” In this paper I extend this concept of propertization into explaining the money-creation mechanism of modern financial instruments including MMF shares and repos (repurchase agreements). The paper also argues that propertization occurred in MMF shares and repos was a key cause of the financial crisis of 2008.

MMFs are a key element of shadow banking, where the financial crisis of 2008 occurred. Shadow banking refers to the bank-like financial activities conducted by unregulated or lightly regulated institutions outside of the traditional banking system. The other two key elements of shadow banking are securitization and repos (Gorton & Metrick 2010), which will be explained later. MMFs are open-ended mutual funds that are registered under Rule 2a-7 of the Investment Company Act of 1940 in the United States. MMFs have rarely been discussed in the literature on the 2008 crisis because many scholars have focused too much on securitization and subprime mortgages. However, as a few scholars have correctly noticed, MMFs played a decisive role in creating the crisis (Gorton & Metrick 2010) and transmitted it to Western Europe (Baba, Robert, & Ramaswamy 2009).

The intertwined relationship between finance and property makes it possible to rethink the conventional dichotomy of law and finance. The literature on law and finance considers law and finance to influence each other, but it treats them as separate spheres that do not constitute each other’s nature. According to this conventional dichotomy, the role of the law is at most to provide a good *regulatory* legal environment to facilitate financial interactions. This conventional view is opposed to the institutionalist perspective, according to which institutions, including the institution of law, constitute the very nature of economic phenomena (Pistor 2013). This paper uses this institutionalist perspective and identifies the current legal structure and decisions that have determined the very nature of shares,

including MMF shares. By doing so, it overcomes the conventional dichotomy between law and finance.

Western law has Roman origins and is structured by the Roman legal division of property and contract. The paper explains how this Roman legal structure became the foundation on which the nature of shares, including MMF shares, was established. It argues that MMF shares violate the traditional Roman legal division because the propertization was regarded as illegal from the standpoint of the Roman legal principle. But at the same time, MMF shares grow out of the legal division. If property rights were not devised separately from contractual rights in the late Roman Republic, society could not grant property rights to contractual claims. This argument allows us to approach the issue of financial reform differently from the current discourse on the subject. The current discourse never considers the necessity of reforming (investment) company legislation itself, focusing instead mostly on how to externally regulate the greedy and ill-behaved finance sector by adding more regulatory schemes and governmental intervention. This paper briefly discusses in the conclusion how to reform (investment) company law or the structure of the law itself in order to create a just, stable, and sustainable financial system.

This paper begins by examining how property rights originated in the late Roman Republic and how these rights were considered to be fundamentally different from contractual rights by traditional Roman law. The paper then explores how the law in modern times has come to grant the privileges of property to its opposite, contractual rights, in shares, including MMF shares. Then it discusses how this propertization of MMF shares played a decisive role in creating the financial crisis of 2008. The paper ends by discussing financial reform policy from a legal perspective.

Property Rights versus Contractual Rights

The concept of property has haunted Western law for 2,000 years. Property is legally defined as rights *in rem* (rights in things), in contrast to contracts, which are defined as rights *in personam* (rights in persons). This definition of property as a relation between person and thing has a metaphysical implication. It implies that property rights are natural rights regardless of whether other people have agreed to them, in contrast to contractual rights, which are considered to be created by an agreement between persons. This metaphysical conception of property is, as Orlando Patterson has argued (1982, p. 32), a fiction, because property is, in reality, a relation between ourselves and everyone else. If a person can exert her absolute power over her possessions, she can do so because everyone else refrains from interfering with them and allows her to treat them in any way she likes (Graeber 2011, p. 200).

This metaphysically fictional concept of property was invented as a legal category for the first time in the late Roman Republic, and before the time the Romans considered property a set of relationships between persons, more or less like rights *in personam* (Patterson 1982, p. 31). The origin of the new conception of rights *in rem* has been rarely discussed by scholars except Patterson (1982). According to Patterson, the Roman needed a new concept of property that allowed them to distinguish slaves from other persons, when slaves became one of the most sources of wealth and objects of property. Thus, the Romans invented a new concept that imitated the relationship between master and slave, where the slave was conceived of as “above all a res (thing), the only human res” (Patterson 1982, p. 32).

His reasoning sounds correct because the image of rights *in rem* fits well for the image of slaves. As David Graeber (2011, pp. 168-9) describes, the image of slaves is the death of a person, and this death is social one that occurs when a person is forcedly ripped from her context and from all the social relationship that make her a human being. Analogically, rights *in rem* are such a power is to rip out a thing from all social relationship with others and thereby allow an owner to exert absolute power over the thing without agreement with others. For example, if land becomes the object of absolute individual property, it should be ripped from its social relationship. But this is metaphysically impossible because land is hardly owned and cultivated by “an” individual. Land was usually possessed by families rather than individuals, and it was cultivated by many people for generations. Land has often been owned by various people simultaneously. And its rights of use and cultivation are often separated from its legal ownership, and these two rights can belong to different persons. But, land should be ripped from these social context and relationship if land would become an object of property. In fact, this becoming historically entailed violence: the legal enclosure of land in early modern times entailed violence against peasants. This violence seems to be similar to the violence that occurs when a slave is ripped from her social context and relationship.

I (Kim 2014b) offers another interpretation of the invention of rights *in rem*. I argue that the “thing” in the minds of the Romans was not only slaves but also money. I suggest two reasoning why money is a good candidate for the object from which rights *in rem* are derived. First, by comparing another candidate, land, I explain why money is a more perfect object of *individual* absolute rights. Second, I explain a social context in which money had been essential to the everyday life of Romans. Otherwise, the Romans would not project the image of money onto the new legal concept. In fact, the new idea of property appeared in the late Roman Republic not only when hundreds of thousands of captured slaves were pouring into Italy, but also when plundered precious metals, such as gold, silver, and bronze, were also pouring into Italy. These precious metals plundered by Roman soldiers were coined by the captured slaves and changed the Roman Republic into a genuine money economy. Money

was coined in various denominations so that it can be used to buy commodities of various prices. In particular, large quantities of money of small denominations should be coined, so that ordinary people can use it as the main means of procuring products of everyday life. Bronze coinage in the Roman Republic had such a small denomination, and it was coined in extraordinarily large quantities because the army under the Republic was originally paid in bronze (Crawford 1970, p. 47-48). After bronze, silver coinage was introduced, and, by end of the Republic period, gold coinage was being produced regularly. In the late period of the Republic, when the concept of rights *in rem* was created, money of small and big denominations became the dominant medium of social relations.

I (Kim 2014b) then argue that the image the Romans found in coined money was that of the lordship of a king or God. Money can endow its possessor with the ability to cancel any ongoing moral obligations to others—that is, to be totally independent of them. This godlike or king-like image of money seems to have been one reason why Emperor Tiberius declared it “a capital offence to take a coin with the image of Augustus into a brothel or lavatory” (Crawford 1970, p. 47). I argue that this image of a king or god was realized in the new concept of property. Rights *in rem* is absolute power over a thing regardless of whether other people agree or not, and it is the power to ignore any ongoing moral obligations to others—that is, to be totally independent of them. This power can only be possessed by a king or god (Graeber 2011, p. 205).

The godlike ability to cancel and finalize any ongoing moral obligations to others is, in fact, realized in money’s function of finalizing debt obligations. This finality fundamentally differentiates money from credit. Both money and credit can function as media of exchange and be denominated by the same unit of account. Nonetheless, because of its association with finality, the concept of money is the opposite of the concept of credit. The transfer of a credit instrument creates a creditor-debtor relation in which debt obligation is imposed to the transferor. By contrast, money is anything that is generally acceptable in the *final* settlement of creditor-debtor relations, and by this final settlement the transferor becomes free from debt obligation. Later, this paper examines how this finality, in whose image the concept of property was created, allows propertization to transform credit into money in capitalism. Propertization is the process of granting the image of finality to credit and by doing so of transforming credit into money.

How this function of finality was given to money historically? Graeber (2011) offers an explanation. In primitive communal societies, according to him, there was no idea of cold-blooded calculative debt, and thus the modern idea that money can finally settle debt did not exist either. We don’t know precisely when and how calculative interest-bearing debts originated, because they predate writing (Graeber 2011, p. 64). Also, we don’t know the precise historical origin of money whose social role is to finally settle such debts. But some anthropologists find those two existed in ancient Mesopotamia, but the way how they

worked was quite different from what we find nowadays. Interest-bearing debts in ancient Mesopotamia began in commercial loans but later developed also in consumer loans. Money was usually stockpiled in temples or palaces, and merchants usually used credit instruments, rather than money, for their trade. Commercial loans did not create serious social problems because these loans were productive, that is, because they were invested to trade that would be expected to produce surplus. But consumer loans—usury in the classical sense of the term—often threatened to rip society apart (Graeber 2011, p. 65), because these were unproductive and could not expect to produce surplus. They usually loaned to the peasantry who urgently needed food because of a bad harvest. As consumers loans developed, large proportions of the peasantry fell into debt peonage and lose their land to creditors. The way how the society solved such a debt crisis in consumer loans was “clean slate” by which Sumerian and Babylonian kings periodically announced general amnesties: the debt cancellation of consumer loans and the return of land to the peasantry (Graeber 2011, p. 65).

However, the social role of money changed significantly when coinage was invented around the sixth century B.C. (Graeber 2011). It was invented to solve debt crises that occurred in consumer loans. Roman coinage in ancient Rome was a typical example. Debt crises in Rome took a form of conflict between the aristocracy and the poor. To prevent the debt peonage of poor peasants to aristocrats and to maintain a free peasantry, Roman society chose the military option of distributing loot plundered from other societies. In the earlier, ancient credit economy like ancient Mesopotamia, gold, silver, and bronze had been stockpiled in temples. But now they were plundered by Roman soldiers, minted by slaves captured in war, and distributed to soldiers and the population on a massive scale (Graeber 2011, pp. 228-229). Plundered money could allow population to ease their urgent debt obligation.

In addition to the general military option of distributing coins, coins were also used directly when a debt crisis occurred. For example, in 33 A.D., when the moneylenders of Rome attempted to call in all debts, debtors were threatened with having to sell off their land in a rapidly falling market. To solve the debt crisis, Emperor Tiberius provided the debtors with an interest-free loan of one hundred million *sestertii* (Crawford 1970, 46). Money was also the direct solution to the debt crisis of the 80s B.C. Debt reform by L. Valerius Flaccus allowed debtors to pay off their debts at a rate of one *as* on the silver *sestertius* (Crawford 1970, 45). A *sestertius* was previously valued at four *asses*. Interestingly, according to historian Michael Crawford, such political interventions did not occur when currency shortages occurred in 63, 49, and 44 B.C. The lack of intervention in these instances implies that coinage was a political measure to solve debt crises rather than an economic measure to encourage commerce. Even though coinage in Rome played an important role as a means of exchange, this economic function was not its primary purpose. It was instead “an

accidental consequence of the existence of coinage, not the reason for it” (Crawford 1970, 46).

In inventing the absolute power of property owners in the image of the finality of money, the traditional Roman law considered property rights to be different from contractual rights. And in the Roman law, property rights and contractual rights cannot be mixed with them. For example, under Roman law, a depositor’s rights are considered different from a creditor’s rights. The rights of a depositor are, on the one hand, rights *in rem*, and thus a depositor retains legal ownership over the deposited property. A depositary should keep deposits safe, maintain a 100 percent reserve, and honour depositors’ requests to *withdraw deposits at any time on demand*, and depositors are charged a safekeeping fee. On the other hand, in a loan transaction the rights of a creditor are rights *in personam*. The creditor cedes legal ownership of property to a debtor *during a specified period* and, in exchange, obtains a debt claim that goes against a person. The creditor can oblige the debtor to fulfil an obligation to repay the principal and the interest.

Table 1, Deposits versus Loans in Roman Law

	Legal Category	Ownership	Purpose	Temporality	Reserve
Deposits	Rights <i>in rem</i>	Not transferred	Safekeeping	Withdraw on demand	100%
Loans	Rights <i>in personam</i>	Transferred	Interest-gaining	Fixed specific period	No reserve

These two inherently disparate transactions are mixed when depositaries attempt to loan deposited funds for profit while depositors enjoy the rights to withdraw and use deposits at any time on demand. This mixture is the essence of modern commercial banking. This was systematically institutionalized first by London goldsmith-bankers in late seventeenth-century England. This beginning of modern commercial banking has been examined extensively by myself elsewhere (2011). What goldsmith-bankers institutionalized was the propertization of a contract. These goldsmiths made a loan *contract* with their depositors. In this contract, the depositors allowed the goldsmiths to loan deposited funds to third parties in the bankers’ name for profit. Here, the goldsmith became debtors, and the depositors became creditors. But at the same time, the contract was propertized because the depositors were still granted property rights to withdraw and use deposits at any time on demand.

In fact, this attempt to propertize contracts was considered embezzlement in the Roman law tradition. In this tradition, an honest depositary of even fungible things, such as

money or grain, had to keep one hundred percent tantundem of deposits (Huerta de Soto 2009). In the Middle Ages, private banks in Continent Europe also abused the belief of depositors by loaning deposited funds to other customers. Governments on the Continent established public deposit banks to exact credit for public expenses, especially international wars. But these abuses by private and public deposit banks were frequently the object of public accusation *due to the Roman law heritage* in Continental Europe. In Catalonia in 1360, for example, a banker who had failed to return deposits to depositors was beheaded in accordance with the law (Huerta de Soto 2009, p. 76). And Continental public deposit banks were strictly forbidden to loan deposited funds to private individuals (de Roover 1974, p. 228).

Propertization

From the modern point of view, the absolute power of property owners under Roman law was still limited due to its strict division of rights *in rem* and rights *in personam*. Shareholders in MMFs likely think that they deserve what they now enjoy—including voting rights at general meetings, redemption rights on demand, and limited liability. But from a historical legal perspective, what they enjoy is an undeserved privilege that other simple creditors or property owners cannot enjoy. By mixing rights *in rem* and rights *in personam* cleverly, the privilege allows shareholders to enjoy the benefits and reduce the costs of both property rights and creditors' rights. I call the process of generating this privilege as propertization of contractual claims.

Let us examine how the privilege was established historically: first, shares in ordinary companies and then MMF shares. This paper argues that this establishment was possible because the law treats shareholders *ambivalently*: it treats shareholders' rights as property rights and at the same time as contractual rights.

On the one hand, the law has treated shareholders as the owners of a company. For example, the law has granted shareholders voting rights at a general meeting to appoint and dismiss directors. And a company is legally bound to work in the best interest of its shareholders. These property rights have been continuously granted even though shareholders no longer carry the duties and responsibilities of traditional owners, that is, even though they are mere creditors in term of duties and responsibilities. But the property rights enjoyed by shareholders are not the traditional sense of property rights because the law no longer treats shareholders as the owners of the *assets* of a company since the British case of *Bligh v. Brent* in 1837. Shareholders cannot use the assets, cannot lend them out to others, and cannot use them as collateral. But the law still treats shareholders as the owners of *the company*, though not of its property.¹ Shareholders gives up the immediate controlling

¹ *Her Majesty's Commissioners of Inland Revenue v. Laird Group PLC* (2003), UKHL 54 at para 35.

rights over the assets but instead exert controlling power at a distance on the company, and this distant controlling power explains, as shall be seen, how shareholders enjoy the privilege that other simple creditors or property owners cannot enjoy.

Some scholars might disagree with my argument that shareholders enjoy property rights. And they might argue that the company cannot be owned because it is not a thing that can be owned. Against this counterargument, I suggest two facts that they should consider. First, property is a tendency to transform what is essentially *not* an object of exclusive possession of an individual or collective person into property. As mentioned, slave and land are essentially not property, but the law of property in Ancient Rome and modern times *forcedly* made them into property. The way of this propertization was, as explained earlier, to make slave and land “rem (thing)” that can be easily removed from their social relations with their family and community. A corporation is essentially not a property because it is a group of persons. Persons cannot be owned by other persons. If so, a corporation—a group of persons—would be treated like slaves. It is what happens in modern times. It is treated as property.

How to substantially put a corporation under the possessive power of dominant shareholders depends on the concrete methods of corporate governance as well as on political and legal environment. The current corporate governance mechanism in the U.S. seems to allow the largest shareholder to substantially put a corporation under her/his possessive power. This substantial power can be noticed if we compare corporate governance with political governance. Different from the politician representation of “one person, one vote” rule, corporate governance is based on the representation of “one share, one vote” rule. This rule allows the rich largest shareholder to be able to earn a substantial amount of voting rights enough to monopolistically controlling a corporation. And different from the political representation of the U.S. that does not allow people to recall the members of the House of representative, the dominant shareholder has rights not only to elect a board of directors but also dismiss them. These differences would contribute to the fact that the dismissal rate of corporate CEOs has been much higher than that of the members of the House. In the U.S., almost no members of the House are removed from office involuntarily, and the House re-election rates are between 87 and 98 percent between 1950 and 2016 (Murse 2018). By contrast, “CEOs are as likely to leave prematurely as to retire normally” around 2005 in the US (Boaz 2006). The high re-election rates of the House members do not imply that the members the House have performed so much better than the CEOs of business corporation. Rather, the largest shareholder’s right to dismiss CEOs is effective, while voters’ right to dismiss the House members is not. Shareholders’ controlling right of a corporation is more substantial than voters’ right to control their political representatives.

The substantial property rights of the largest shareholder depend also on political and legal environment. Before the 1970s, managerialism predominated, and political and legal

environment emphasized the social roles of the professional managers of corporations in achieving full employment and welfare policy. In this political environment, the power of the largest shareholder was relatively inferior to the professional managers. And legal decisions made in courts was also favourable to the managers than to the largest shareholder. But after the time when Neo-liberalism become predominant in the late 1970s, political and legal environment become more favourable to shareholders than to professional managers. This period is called era of shareholder primacy in which the power of the largest shareholder to control a corporation became substantial. To sum up, we can say that the largest shareholder who has a substantial amount of voting rights enough to monopolistically controlling a corporation has property rights on the corporation. The corporation is essentially not property but made into it.

On the other hand, the law has increasingly treated them as creditors. For example, since *Bligh v. Brent*, the law has considered the legal and equitable ownership of capital to be completely transferred to the company from shareholders. This legal decision implied that shareholders were no longer the owners of the property of the company. And via the 1855-62 Companies Acts the law granted them limited liability. Here, the legal status of shareholders became like that of creditors, who lose only their loaned money when a debtor goes bankrupt. This creditor's right—limited liability—was granted to shareholders, according to Ireland (2010), not because of the demands of advanced technology and economic efficiency, but because of a political demand to accommodate and protect the interest of rentier investors. Ireland argues that the Industrial Revolution in the United Kingdom at that time did not need limited liability because manufacturing was predominantly carried out by ordinary partnership (Ireland 2010, p. 839).

This dual treatment of the individual members of a corporation not only as its owners but also as its creditors is a strange formation because creditors have usually been the outsiders of a group. Members are insiders, and as long as they are the member-owners of a group, their responsibilities and liabilities are unlimited, as with partnerships. Partners in a partnership were differentiated from creditors under Roman law. A partner is, as seen in Table 2, an *insider* and a member-owner who shares assets, duties, responsibilities, and risks with other partners. Unlike a creditor, a partner did not transfer the ownership of his money to other partners. By contrast, a creditor is an *outsider* who has limited liability when a debtor goes bankrupt and who has no responsibility for the debtor's wrongful behaviour. This differentiation of partnerships and loans was inherited by canon law in medieval Europe and was received into civil law and English partnership law (Ireland 1999, pp. 35-36). English partnership law "presumed that each partner was an active trader in a joint concern [with] full power to act as agent of his fellow partners" (Lobban 1996, pp. 397, 399).

Table 2. Partnership versus Loans in Roman Law

	Legal Category	Ownership	Assets, responsibilities, duties,	Liability
Partnership	Rights <i>in rem</i>	Not transferred	Shared	Unlimited
Loans	Rights <i>in personam</i>	Transferred	Not shared	Limited

The law's ambivalent treatment of shareholders is reflected in the ambivalent legal definition of shares. The most popular definition was provided by Farwell J in *Borland's Trustee v. Steel Bros & Co Ltd* in 1901:

A share is the interest of a shareholder in the company measured by a sum of money, for the purpose of liability in the first place, and of interest in the second, but also consisting of a series of mutual covenants entered into by all the shareholders *inter se* in accordance with [s14 of the Companies Act 1985]. The contract contained in the articles of association is one of the original incidents of the share. A share is ... an interest measured by a sum of money and made up of various rights contained in the contract, including the right to a sum of money of a more or less amount.²

This definition is ambivalent because it contains two distinct rights together: creditors' rights and property rights. The words "the purpose of liability" imply creditors' rights, but the words "interest in the company" imply property rights. In spite of this ambivalence, this definition emphasizes contractual rights. Against this emphasis, other legal theorists and courts have emphasized property rights. For example, legal theorist L.C.B. Gower explains that the above definition is trying "to equate shares with right under a contract.... [But] a share is something far more than mere contractual rights *in personam*.... [T]he share itself is an object of dominion, i.e. of rights *in rem*" (Davies 1997, p. 144). And recently, in *Her Majesty's Commissioners of Inland Revenue v. Laird Group PLC* in 2003, Lord Millet emphasized the property rights of shares:

It is customary to describe [a share] as "bundle of rights and liabilities," and this is probably the nearest that one can get to its character, provided that it is appreciated that it is more than a bundle of contractual rights.... These rights,

² [1901] 1 Ch 279, 288.

however, are not purely personal rights. They confer proprietary rights in the company though not in its property.³

This trend of containing the two rights simultaneously in shares but emphasizing one of the two demonstrates the ambivalence of legal theorists towards shares.

The struggle to fit shares into an existing legal category is bound to fail because the law has granted shares what it is unable to conceptualize. The legal categories available to legal theorists and courts are only the two categories—property (rights *in rem*) and contract (rights *in personam*)—but they are too distinct to allow a middle ground between them. In spite of the exclusivity of the two rights, the law has historically granted shares both rights.

This situation that has been applied to ordinary shares also applies to MMF shares. The US Investment Company Act grants MMF shareholders, like ordinary shareholders, both creditors' rights, such as limited liability, and property rights, such as voting rights to elect directors, approve changes to fundamental policies with respect to key investment activities, and approve management contracts (Kaplowitz 2014).

MMF shares differ from ordinary shares largely in three respects. First, the ability of MMFs to buy other MMFs' shares is legally limited. For example, it is illegal for an MMF to acquire more than 3 percent of the outstanding shares of another MMF (Kaplowitz 2014, p. 121). Here, large shareholders' power to control other MMFs is legally limited. Second, unlike ordinary shareholders, MMF shareholders redeem their shares on demand on the same day, by writing checks. In 1977, Merrill Lynch for the first time introduced "cash management accounts" from which their shareholders could write checks (FCIC 2011, p. 30). Lastly, unlike ordinary shareholders, MMF shareholders are promised that a share maintains a net asset value of \$1.

The last two aspects make MMF shares an even more contradictory combination of rights *in rem* and rights *in personam*, because they cause the ownership of the money invested in MMFs to be both *transferred* and *not transferred* from shareholders to the fund. On the one hand, ownership is not transferred: because MMF shareholders can withdraw the funds invested in the pool of MMFs at any time on demand by writing checks, they practically retain the present availability and ownership of the funds. A portion of the pool remains as the property of a shareholder, and because the ownership is *not transferred* to MMFs from the shareholders, the shareholders enjoy rights *in rem*, and the relationship between the shareholders and the funds is an owner-representative relationship. On the other hand, the ownership is transferred: MMFs lend the funds at their own discretion and in their own names, attaining and retaining the ownership title of the loans. Thus, the ownership of the

³ UKHL 54 at para 35.

funds is *transferred* from MMF shareholders to MMFs because a person can lend property in his or her name only when he or she has ownership of it. As long as the ownership is transferred, the rights of MMF shareholders are rights *in personam*, and the relationship between the shareholders and MMFs is a creditor-debtor relationship. How can the ownership of a thing be *transferred* and *not transferred* simultaneously? This situation is self-contradictory, and this self-contradiction occurs because of propertization, that is, because shareholders who are mere creditors are granted rights *in rem*, the rights to use and withdraw funds at any time by writing checks.

In MMF shares, two disparate purposes coexist—interest gaining, which characterizes a loan transaction, and the right to redeem an investment on demand, which characterizes a deposit transaction. Since the late Middle Ages, one justification for charging interest on a loan has been what economics today calls opportunity cost. Interest is considered compensation for the giving-up of the present availability and ownership of funds for a specific period. However, MMF shares do not entail an opportunity cost because they are paid at any time on demand. In spite of this lack of opportunity cost, gaining interest is one of the purposes of MMFs. This coexistence is the hybrid between rights *in rem* and rights *in personam*.

This propertized hybridity is the money-creation mechanism of modern finance. It creates a double-ownership structure in which two exclusive owners—shareholders and MMFs—enjoy the present availability of the same amount of funds. This double-ownership is a creation of an additional ownership title on one and the same amount of money. This double ownership differs from fragmented or shared ownership. While in fragmented ownership each owner has exclusive ownership of only part of the property, in double ownership each owner has exclusive ownership of the whole property. While in shared ownership each owner cannot use or sell a shared property without the consent of other owners, in double ownership each owner has the free right to use and sell the property without the consent of the other owners.

To sum up, the hybridity of shareholders' rights aims to enhance the absolute ownership of property—rights *in rem*. To express this situation in Hegelian style, shareholders enhance their property rights far beyond the limit of traditional property rights by appropriating their opposite, creditors' rights, as their element. In other words, the enhancement grows out of the pure individualism of rights *in rem* but utilizes its opposite: rights *in personam* and collectivism (the legal personality of a company).

If this situation is described the other way around, the enhancement can be called propertization. As mentioned before, shareholders, including MMF shareholders, are almost reduced to creditors in their economic substance. Following this trend, *Bligh v. Brent* regarded shareholders as creditors who completely transfer the legal and equitable

ownership of capital to the company, and the 1855-62 Companies Acts granted shareholders limited liability. Because the law began to treat shareholders as creditors, it should have stopped granting them the opposite—property rights—if it had wanted to maintain consistency in the legal principle that separates the two legal categories—property and contract. But the law has given up its consistency by continuing to grant property rights as well. In the case of MMFs, shareholders still enjoy the ability to finalize their creditor-debtor contracts freely at any time on demand by writing checks. This propertization creates a double-ownership scheme, a money-creation mechanism. Here, propertization grants the privileged finality of money, in whose image the concept of property was created, to creditor-debtor contracts, and by doing so it transforms credit into money.

This propertization is a key cause of the emergence of big institutional debtors. By offering shareholders the two disparate benefits together—interest gathering and redemption rights on demand—MMFs can collect huge amounts of capital. Because most of the time their creditors—shareholders—would not all withdraw their money simultaneously, a portion of the debts remains in the hands of MMFs and is transformed into permanent capital that MMFs do not need to repay and can use for their own gain most of the time.

MMF assets have grown rapidly, from less than \$2 billion in 1974 to \$11 billion in 1978, to \$76 billion in 1980, to \$1 trillion in 1997, and to nearly \$4 trillion in 2009 (Fink 2014, p. 87). This rapid growth has been possible because MMFs have offered both the *demand*-deposit services of safekeeping *and* high interest to the large amounts of funds, often in billions of dollars, of institutional investors such as asset managers and global corporations. Commercial banks could not match these interest rates because an interest ceiling had been imposed on their demand-deposits by Regulation Q from 1933 until 2011 (Fink 2014, p. 86).

Propertization & the Crisis

Before discussing how the propertization of MMF shares played a decisive role in the crisis, we need to understand the mechanism of “off-balance-sheet financing,” where the financial crisis of 2008 occurred.

This financing, which has been popular for the last few decades, began when the supply side of the financing, commercial banks, no longer held their assets, which generate a stream of income over the long term, on their balance sheets. These assets include mortgage loans, credit-card loans, and automobile loans that the banks offer to their customers. The banks transfer the portfolios of these loans to a trust company (a special-purpose conduit), and the trust company slices the pool of debts into different tranches, which it then sells to investors. These products are called asset-backed securities (ABSs) and collateralized debt obligations (CDOs). To raise funds to buy these products, those conduits sell short-term asset-backed

commercial papers (ABCPs). These safe ABCPs are ensured a AAA rating and sold primarily to MMFs. The sale of these products is usually brokered by broker-dealers such as Merrill Lynch and Morgan Stanley. This off-balance-sheet financing has become so popular in part because of the banks' need to avoid the capital-regulation requirement imposed by the Basel I Accord (Brunnermeier, 2009, pp. 80-81). However, the main reason for its popularity is the high demand for securitized products from investment banking, especially from MMFs for safe, high-quality assets to invest in (FCIC 2011, p. 30).

Before the 2008 crisis, as I (2014a) argues elsewhere, off-balance-sheet financing looked safe from standpoint of investors. For example, large banks typically promised to provide credit guarantees to their conduits if the conduits faced a default. And the CDOs sold to the demand side of off-balance-sheet financing were mainly the safest tranches, and the toxic waste—the most junior tranche of subprime mortgage loans—was often held by the issuing bank and was thus rarely injected into the off-balance-sheet financing. But investors created a run on MMMFs, and these funds suddenly created a run on the repo market. The reason for these runs cannot be explained entirely by the sub-prime mortgage crisis because “prospective subprime losses were clearly not large enough on their own to account for the magnitude of the crisis,” as Ben Bernanke claimed (quoted in FCIC, 2011, p 27)

MMFs are the demand side of the off-balance-sheet financing. The crisis of 2008 began within the *demand side* of the off-balance-sheet financing, *when* investors, especially institutional investors, created a run on MMFs (Brunnermeier 2009; Gorton and Metrick 2010). Unlike other mutual funds, MMFs are exempted by the Security and Exchange Commission's (SEC) “Rule 2a-7” from mark-to-market, so that MMFs do not adjust their prices per share to reflect the daily market value of their assets. Thus, MMFs can claim that their assets are always worth 100 cents on the dollar, even when they are not. MMFs are also open ended, making it possible for their retail investors to redeem their shares on demand on the same day. Together with the open-endedness of the shares, by promising to maintain a net asset value of \$1 per share, MMFs falsely lead their shareholders to believe that what they have kept in MMFs is *cash*.⁴ However, in reality the cash that MMF shareholders invest in MMFs is loaned to third parties in the name of MMFs. When the shareholders suddenly realize that their belief is wrong and that MMFs' loan to their parties might be in trouble, they create a run on MMFs. On September 16, 2008, when the Reserve Primary Fund—a large MMF with \$65 billion in assets—announced that its shares were worth only 97 cents, it faced about \$39.6 billion in redemption requests. This event triggered bank runs on other MMFs and resulted in the withdrawal of about \$172 billion in a week (Kacperczyk & Schnabl

⁴ In the UK, this false belief is written into the law. English law regards money market deposits as ‘cash,’ differentiated from financial instruments that include shares in companies or bonds. According to the Financial Collateral Arrangements (No. 2) Regulations 2003, Article 3, “‘cash’ means money in any currency, credited to an account, or a similar claim for repayment of money and includes money market deposits [...]”

2010, p. 41). MMFs were thus forced to sell their assets, such as commercial papers (CP) and certificates of deposits (CD), at fire-sale prices, creating a major liquidity crisis among the prime borrowers in the CP and CD markets. Such runs would have been much greater, and the U.S. financial system would have collapsed, had the U.S. Department of the Treasury not promised temporary deposit insurance covering the entire \$3.45 trillion worth of MMMFs on September 19.

MMFs also transmitted the crisis in the United States to Western Europe. At that time, MMFs in the US invested massively in European banks, especially in certificates of deposits issued by the banks. Interestingly, the large part of these purchase by MMFs started after August 2007 because they wanted to find safer investment in order to be away from the subprime mortgage crisis of 2007. In September 2008 when MMFs sold commercial paper and certificates of deposits at fire-sale prices, a major liquidity crisis among European banks was created (Baba, Robert, & Ramaswamy 2009). This private-banking crisis of European banks became a sovereign-debt crisis when European states provided bailout packages to the banks.

The above-mentioned double-ownership scheme of MMF shares is almost the same as that of commercial banks. In commercial banking, one amount of cash deposits creates two cash balances of the same amount, one for depositors and the other for a commercial bank. This double-ownership scheme has historically created financial crises, exposing a community to a new type of risk like the risk in a “pass the parcel” game, in which “the loser is the one holding the parcel when the music stops” (Kim 2011). When depositors in commercial banks suddenly realize that the banks’ loans to third parties are in trouble, they create a run on the banks in order not to be the loser. A similar form of bank run happened with MMFs in 2008. This run happened because the creditor-like shareholders had a property right, the right to withdraw funds at any time on demand. When the shareholders run on MMFs in order not to be the loser, they shift the risk to others and create the risk of financial collapse. In this sense, as Gorton and Metrick (2011, p. 2) argue, the crisis of 2008 is analogous to the banking panics of the 19th century that happened because of bank runs in the demand deposits of commercial banks.

MMFs also expanded the crisis by contributing to the creation of another propertization, a repo. A repo consists of two sales transactions in which the seller (in our example, a broker-dealer) sells an asset to the buyer (in our example, MMFs) with a promise to repurchase the same asset at a higher price in the future. A repo is in its economic substance a secured loan in which a debtor pledges some asset as collateral for the loan. The selling price of the asset becomes the amount of the loan, and the difference between the selling price and the repurchased price becomes interest. In 2008, MMFs made a run on repo markets. This run and the resultant collapse of repo markets were a major event that

generated a systemic crisis (Gorton and Metrick 2010). MMFs could make these runs because their investment in repo markets was, as shall be seen, propertized.

Interestingly, this propertization of repos was demanded by MMFs. The Investment Company Act restricted mutual fund investment in entities engaged in securities-related businesses, because a mutual fund can be exposed to the risks of the business. This restriction should have been applied to repos when a broker-dealer is counterparty, because MMFs' investment in repos is in economic substance a loan and MMFs are therefore exposed to the risk of the loan. But the US SEC made an exception for repos to satisfy MMFs' investment demand. The SEC did so by regarding repos as a "purchase" of securities rather than a "debt" of the broker-dealer *when the purchase satisfies certain conditions* (Kaplowitz 2014, pp. 122-3). These conditions include: (1) the legal ownership of the collaterals should be completely transferred to MMFs; and (2) MMFs should be excluded from the Chapter 11 bankruptcy process and be permitted to withdraw their investment when the seller of a repo goes bankrupt (Kaplowitz 2014, pp. 122-3).

As shall be seen below, if an investment satisfies these two conditions, an investor (a creditor) is granted property rights that other simple creditors do not enjoy. It is a scheme of propertization. Repos can satisfy those two conditions because they are structured as a sale, even though they are in economic substance a secured loan. Unlike a secured loan, however, a repo satisfies the above condition (1). Because a repo takes the form of a sale, the ownership of collateral is *transferred* from a debtor (a seller) to a creditor (a buyer, MMFs in our case) in repo contracts. This transfer does not occur in a secure-loan contract. In a secure-loan contract, a debtor retains property rights in the collateral, and a creditor has a right to possess the collateral or to sell it only after the debtor breaches a payment obligation. In contrast, the creditor in a repo has complete power and the right to possess and sell the collateral because the ownership of collateral is completely transferred to the creditor (in our case, an MMF). The creditor (buyer) is only obliged to replace the collateral with an equivalent security by the date of the repurchase contract.

A single piece of collateral is often used to effect settlement in a number of repo contracts on the same day. This further use of collateral is called rehypothecation. Through rehypothecation, for example, a broker-dealer can leverage her initial capital twenty times in the repo market (Gorton and Metrick 2010; Singh and Aitken 2010). Before their bankruptcies, Bear Stearns and Lehman Brothers had leverage ratios of over 30:1 (Duffie 2010, 61). Money is created here as in commercial banks' demand deposits. As mentioned, the selling price of collateral is the amount of the loan that is delivered to the debtor of a repo. The debtor enjoys the ownership of the loan and uses its present availability. But at the same time, its creditor takes the ownership of the collateral and uses it for other contracts. It is money creation because the creditor does not loan any money to a debtor from the perspective of the creditor, even though the debtor borrows and uses the money. This money

creation happens because repos are a scheme of propertization, that is, because the creditors of repos are granted property rights on collaterals.

Conditions (1) and (2) grant a repo buyer the property right to freely withdraw their investment when the seller goes bankrupt. Because repos are loan contracts in their economic substance, they should have been subject to the Chapter 11 bankruptcy process. This bankruptcy process is designed to distribute the assets of a bankrupt debtor as fairly as possible among the creditors. The process includes an automatic stay, which prevents creditors from collecting a debtor's assets before a court assesses both the value of the debtor's assets and the full extent of creditors' claims. The process also voids any recent payments made by the firm, because payments made just prior to bankruptcy can favour one creditor over others. This procedure is called avoidance. Thus, collateral posted against a derivative contract during the ninety days before declaring bankruptcy is subject to avoidance. A repo, however, is excluded from the Chapter 11 bankruptcy process and is thus not subject to the requirements of an automatic stay and avoidance because repos legally take the form of a sale contract. This way, creditors can quickly withdraw the contract by selling collaterals before their prices collapse, even when a debtor goes bankrupt. This advantage of repos has been criticized for giving creditors of repos an unfair privilege because other creditors cannot withdraw their loans until after a court decision. This privilege is a property right—the right of property owners to withdraw their money and finalize a contract regardless of the agreement and consensus between parties, including creditors and the court.

This propertization, which grants the creditors of repos property rights, has led to the boom of the repo market over the last few decades. Even though there is no official data, the US repo market exceeded \$10 trillion in mid-2008 (Gorton and Metrick 2010). In December 2008, MMFs alone held \$552 billion in repos (Gorton and Metrick 2011, p. 8). But a run on repo markets occurred in 2008 because the creditors of repos (in our case, MMFs) could enjoy the property right of withdrawing their investment quickly when debtors go bankrupt, while other creditors have to wait until a court makes its decision.

To sum up, a repo is a propertization of contractual claims. Even though the buyers in repos are in their economic substance merely creditors having rights *in personam*, they can also enjoy rights *in rem* because the repo is disguisedly structured as a sale: the law considers a buyer of a repo (the creditor) to have rights *in rem* on collateral. This propertization grants the privileged finality of money, in whose image the concept of property was created, to a creditor-debtor contract, and by doing so the creditors of repos finalize their creditor-debtor contracts freely without the above-mentioned intervention of bankruptcy courts.

Propertization in repos would not have been possible without political support from Congress. In 1982, a US bankruptcy court in *In re Lombard-Wall* ruled that a repo is a secured

loan and ordered the buyer (creditor) of a repo to turn over the collateral to the seller. This court decision made collateral posted for a repo subject to the requirement of an automatic stay during the bankruptcy process. This decision aimed to defeat the artful self-serving attempts by lawyers and financiers to make loan transactions look like sale transactions in order to avoid the bankruptcy process (Schroeder 1996). But this court's decision so distressed the government, the Federal Reserve, and the financial community, which feared that it would impair repo markets, that Congress attempted to override it in 1984 by amending the Bankruptcy Code and exempting repos from the bankruptcy process (Schroeder 1996, p. 1011). Since then, when the courts have considered the nature of repos for bankruptcy purposes, they have determined them to be sales, and to support this decision they have prioritized the form of the contracts over their substance.⁵ This prioritization differs from the early decisions of the courts in *United States v. Drickson* (1979) and *SEC v. Miller* (1980), which considered the economic substance of the contract when they addressed the nature of repos. But US courts still consider the economic substance of the contract when they have to deal with the issue of the taxability of the interest income received by the creditors of repos. For example, the United States Supreme Court, in *Nebraska Department of Revenue v. Loewenstein* (1994), justified government taxation of interest income by declaring that "It does not matter that the Trusts and Seller-Borrower characterize the repos as sales and repurchases, since the substance and economic realities of the transactions show that the Trusts receive interest on cash they have lent to the Seller-Borrower." It would be interesting to research what happened when Congress attempted to override the legal reasoning made in *In re Lombard-Wall*. A detailed story of the relationship between MMFs, the SEC, the Federal Reserve, the government, and other institutional investors at that time would improve our understanding of the political economy of finance and law.

Conclusion

The use of the finality of money in the Roman Republic and Empire was a substitute for an old solution to debt crises. Previously, in Babylonian, Sumerian, and other ancient civilizations, consumer debts, which ordinary people owed to tax farmers, were cancelled without the use of money. They were simply cancelled by the emperor in a periodic "redemption" or "year of jubilation." The difference from this old solution was that money allowed the Romans to solve debt crises even when creditors were still repaid—that is, even when creditors' rights were still guaranteed. As Graeber (2011) demonstrates, coinage ultimately could not solve Roman debt crises. The supply of coinage based on the imperial option only mitigated crises temporally. Thus, by the end of the Roman period, most people in the countryside had become debt peons to rich landlords (Graeber 2011, 232). Since the

⁵ For example, see *Cohen v. Army Moral Support Fund*, 67 B.R. at 598.

financial crisis of 2008, enormous amounts of money have been created in order to bail out private banks and boost the money economy. However, if what has been true historically is true today, the creation and injection of money is not the real solution. It will merely postpone the bursting of the capitalist economy. A real solution would be the cancelation of the debt of individuals without using money.

Modern times began when natural-rights theorists resettled the concept of absolute property rights on the basis of Roman law around the seventeenth century. Its example was John Locke's natural-right theory of property that provided the ideological foundation for the Glorious Revolution. For him, property rights are absolute in the sense that they exist prior to the establishment of social institutions or an agreement with other people (Please see Kim 2014a, pp. 327-8). The current legal practice of fitting certain economic transactions into two different legal categories, property or contract, is definitely of Roman heritage. In this sense, our times are an extension of Roman times, but with an important difference: we freely propertize contractual rights by granting the privileges of property rights to creditors. That is, financiers are granted rights *in rem* over credit claims and thereby create a hybrid of property and contract. I argued that this propertized, hybrid ownership scheme constitutes the essence of MMF shares and the cause for the current global financial crisis.

I conclude this paper by commenting on a possible reform policy of the current financial system from a new perspective. This comment is brief and incomplete, but it offers a direction for future research. The current discourse focuses on how to externally regulate the greedy and ill-behaved finance sector by adding more regulatory schemes and governmental intervention. This paper implies that we should reform company law or the structure of the law if we want to reform finance in a more fundamental way. One reform policy would be to prohibit any propertization of contractual rights, that is, to prevent all financial investors from enjoying both legal rights simultaneously. In the same vein, Ireland (2010) offers a radical reform policy to correct corporate irresponsibility. He argues that the policy should strictly divide creditors' rights from property rights, that is, decouple limited liability from control rights. The same reform policy can be applied to MMF reform. MMF shareholders are merely functionless creditors with limited responsibility. The reform would involve no longer granting them property rights in their shares, that is, to abolish the redemption rights of MMF shareholders at par.

Our discussion allows us to rethink the concept of property rights (rights *in rem*). Property rights are, as mentioned, a metaphysical fiction. If so, the property rights of MMF shareholders are a legal fiction as well. MMF shareholders enjoy the property right of being able to redeem their shares at any time on demand at par. We saw that this right leads MMF shareholders to enjoy enhanced property rights, to shift a risk to others, and eventually to cause a systemic instability of finance that negatively affects an indefinite class of persons.

This situation opens a question: why should the law support these metaphysically fictional rights that privilege a small group of persons and affect the world negatively?

For centuries, social scientists have debated the legitimacy of property rights. Some have considered property rights to be natural and inviolable, and have argued that they should therefore be protected by the state. Following this line of reasoning, property rights have been established at law. Others have maintained that property rights are created by an agreement between people and can thus be redistributed, regulated, or re-contracted through another agreement or by the state for the purpose of the wellbeing of society. This paper attempts to contribute to the rediscovery of this classical discussion of property rights as something directly relevant to the current global crisis, as something central to our understanding the cause of and solution to the crisis.

References

- Baba, N., M. N. Robert and S. Ramaswamy. 2009. US dollar money market funds and non-US banks, *BIS Quarterly Review*, 65-81.
- Boaz, D. 2006. Political Governance vs. Corporate Governance, *Cato Institute*, <https://www.cato.org/blog/political-governance-vs-corporate-governance>, accessed on July 22, 2018.
- Brunnermeier, M. K. 2009. Deciphering the Liquidity and Credit Crunch 2007–2008. *Journal of Economic Perspectives*, vol. 23, no. 1, 77–100.
- Crawford, M. 1970. Money and Exchange in the Roman World, *Journal of Roman Studies*, vol. 60, 40-48.
- Davies, P. 1997. *Gower's Principles of Modern Company Law* (6th ed.). London: Sweet & Maxwell.
- de Roover, R. 1974. *Business, Banking, and Economic Thought in Late Medieval and Early Modern Europe*. Chicago: University of Chicago Press.
- Duffie, D. 2010. The Failure Mechanics of Dealer Banks, *Journal of Economic Perspectives*, vol. 24, no. 1, 51-72.
- The Financial Collateral Arrangements (No.2) Regulations. 2003.

http://ec.europa.eu/internal_market/finances/docs/actionplan/transposition/uk/d7.1-ml-uk.pdf
- Financial Crisis Inquiry Commission (FCIC). 2011. *The Financial Crisis Inquiry Report*.
- Fink, M. P. 2014. The Historical Rationale for US Money Market Funds In *Money Market Funds in the EU and the US: Regulation and Practice*, edited by Viktoria Baklanova and Joseph Tanega, Oxford University Press.
- Gorton, G. and A. Metrick. 2010. Regulating the Shadow Banking System, *Brookings Papers on Economic Activity*, 261-312.
- . 2011. Securitized banking and the run on repo, *Journal of Financial Economics*, vol. 104, no. 3, 425-451.
- Graeber, D. 2011. *Debt: The First 5,000 Years*. Brooklyn, New York: Melville House Publishing.

- Hohfeld, W. N. 1917. Fundamental Legal Conceptions as Applied in Judicial Reasoning, *Yale Law Journal*, vol. 26, no. 8, 710-770.
- Huerta de Soto, J. 2009. *Money, Bank Credit, and Economic Cycles*. Auburn, Alabama: Ludwig von Mises Institute.
- Ireland, P. 1999. Company Law and the Myth of Shareholder Ownership, *The Modern Law Review*, vol. 62, no. 1, 32-57.
- . 2003. Property and Contract in Contemporary Corporate Theory, *Legal Studies*, 453-509.
- . 2010. Limited liability, shareholder rights and the problem of corporate responsibility, *Cambridge Journal of Economics*, vol. 34, no. 5, 837-856.
- Kacperczyk, M. and P. Schnabl. 2010. When Safe Proved Risky: commercial Paper during the Financial Crisis of 2007-2009, *Journal of Economic Perspectives*, vol. 24, no. 1, 29-50.
- Kaplowitz, B. 2014. Regulation of US Money Market Mutual Funds In *Money Market Funds in the EU and the US: Regulation and Practice*, edited by Viktoria Baklanova and Joseph Tanega, Oxford University Press.
- Kim, J. 2011. How Modern Banking Originated: The London Goldsmith-Bankers' Institutionalisation of Trust, *Business History*, vol. 53, no. 6, 939-959.
- . 2014a. Identity and the Hybridity of Modern Finance: How a Specifically Modern Concept of the Self Underlies the Modern Ownership of Property, Trusts and Finance, *The Cambridge Journal of Economics*, vol. 38, no. 2, 425-446.
- . 2014b. Money is Rights *in rem*: A Note on the Nature of Money, *Journal of Economic Issues*.
- Lobban, M. 1996. Nineteenth Century Frauds in Company Formation: Derry v Peek in Context, *Law Quarterly Review*, vol. 112, 287-334.
- Merrill, Thomas W. and Henry E. Smith. 2001. What Happened to Property in Law and Economics?, *Yale Law Journal*, vol. 111, 357-398.
- Murse, T. 2018. Do Members of Congress Ever Lose Re-election? Why Incumbent Members of the House of Representatives Almost Always Win. *ThoughtCo*. <https://www.thoughtco.com/do-congressmen-ever-lose-re-election-3367511>, accessed on July 22, 2018.

- Musto, D. K. 2011. The Economics of Mutual Funds, *The Annual Review of Financial Economics*, vol. 3, 159-72.
- Patterson, O. 1982. *Slavery and Social Death: A Comparative Study*. Cambridge: Harvard University Press.
- Pistor, K. 2013. A Legal Theory of Finance, *Journal of Comparative Economics*, vol. 41, 315-330.
- Schroeder, J. L. 1996. Repo Madness: The Characterization of Repurchase Agreements under the Bankruptcy Code and the U.C.C, *Syracuse Law Review*, vol. 46, 999-1050.
- Singh, M. and J. Aitken. 2010. The (Sizable) Role of Rehypothecation in the Shadow Banking System, *Working Paper WP/10/172*. International Monetary Fund.