

The Financial Crisis as an Expression of Macrohistorical Trends

World Hegemony, Neoliberal Globalization, and
Financialization in 21st Century Capitalism

A Thesis Presented for the
Master of Arts
Degree

The University of Tennessee, Knoxville

Shane Montgomery Willson

December 2011

Copyright © 2011 by Shane Montgomery Willson
All rights reserved

DEDICATION

I dedicate this work to the great women in my life.

I must thank my wife Stacia for dealing with my academic obsessions,
my dog Akira for sitting so loyally in my office on long nights,
and my dearest Mama and Grandma for *everything*.

ACKNOWLEDGEMENTS

This work would not have been possible without the help and guidance of my thesis committee. Jon Shefner, Stephanie Bohon, and Harry Dahms have helped me in more ways than they know. I must thank Dr. Shefner in particular for his comments on many lengthy drafts. They helped turn this project from a rambling mess into something worthwhile.

ABSTRACT

Many studies try to understand the financial crisis that began in 2007 by utilizing short-term perspectives, but few step back far enough to see how macrohistorical transformations created the environment for a crisis of immense magnitude. In this work, I apply Arrighi's theory of systemic cycles of accumulation to the current crisis and find that, while this theory elucidates some broad features of the global political economy that fostered the crisis, Arrighi's explicit limitations lead to further areas of inquiry that help to understand this crisis *in its specificity*.

By analyzing large-scale historical lines unique to the late 20th century, I show that financialization and globalization – mediated through US world hegemony and neoliberalism – created feedback loops promoting, not just a quantitative rise in the use of finance, but qualitative changes to overarching production, distribution, and consumption practices throughout the global economy. Some of these changes include the integration of many new and varied actors into the financial sector, the financialization of the globalized production process, the increased use of finance by lower and middle classes to reproduce labor in the face of stagnant wages, and the increased use of derivatives for profit-making.

Additionally, I elaborate market-level changes in the US financial sector and show how the aforementioned macro-level transformations expressed themselves through the crisis. The use of “slice and dice” and “originate and distribute” models crippled the functions of derivatives and promoted their widespread misuse, even in the face of highly regarded theories of risk management. A historical view of derivatives shows that, while their use may be a fundamental cause of the crisis, derivatives express deeper trends in the evolution of capitalism: derivatives increase alienation, change the way we view ownership, and increase competition in our globalized political economy.

This long-term view allows me to elaborate how the nexus of financialization, globalization, neoliberalism, and world hegemony came together to create the most far-reaching financial crisis since the Great Depression.

TABLE OF CONTENTS

Introduction.....	1
Methods	7
Chapter Summary	8
Systemic Cycles of Accumulation: A Macrohistorical View of the Crisis	13
US Free Worldism	22
Neoliberal Globalization and Financialization	24
A New Research Agenda	26
Neoliberal Globalization and Financialization.....	29
Globalization.....	31
Financialization.....	40
Neoliberalism.....	47
Neoliberal Ideology vs. Neoliberal Practice	49
Political Ideology vs. Academic Ideology	52
From Keynesianism to Neoliberalism	58
The Financial Crisis	69
The New Financial Architecture	71
Derivatives in the Financial Crisis.....	79
Creating the Housing Bubble: Perverse Incentives	86
Derivatives in Global Capitalism.....	106
Conclusion	114
Enlightenment Logic vs. Negative Dialectical Logic	114
Creative Destruction	118
The Creation of Capitalism and the Destruction of Feudalism: Creative Destruction as Primitive Accumulation	119
Creative Destruction as Essential to Capitalism: Dynamism and Increasing Tensions.....	120
The Possibility of the Creative Destruction of Capitalism	122
References.....	125
Appendix: Theoretical and Philosophical Underpinnings	142
Vita.....	151

LIST OF FIGURES

Figure 1: The Rise of the Shadow Banking System	75
Figure 2: Funding for Mortgages.....	88
Figure 3: US Home Prices.....	90
Figure 4: Bank Borrowing and Mortgage Interest Rates.....	90
Figure 5: Rising Compensation in the Financial Sector.....	94
Figure 6: Asset-Backed Securities Outstanding.....	96

Introduction

The financial crisis that began in earnest in 2007 is the most far reaching economic crisis since the Great Depression of the 1930s. Unemployment soars, production slows, and state budget deficits reach staggering levels in all corners of the world. This crisis has affected people all over the globe and such a far-reaching catastrophe has a great number of causes, some immediate and some reaching far back into history. The surface causes of the crisis are mere manifestations of these deeper histories and the crisis itself is only a moment in the broader transformations of social relations that have been moving forward since the inception of capitalism in the 14th century. While the financial crisis will negatively affect many for years to come, it does not present problems that the dynamism of capitalism cannot overcome.

Many in the headlines supposed that the crisis would be short-lived – a single dip recession that would soon be ameliorated (Achustan and Banerji 2010; Geithner 2010; Hennessy 2010; Lawder 2010). High unemployment and low wages have remained consistent since the crisis, and though it seemed for a while that the economy was stabilizing, recent volatility in the stock markets brought on by S&P's downgrade of US public debt – due in great part to the US government's inability to make a timely decision on raising the debt ceiling – shows that a second dip to the recession is increasingly probable (Jing 2011; Lahart 2011; McIntyre 2011; Norris 2011; Stanley 2011). The question remains as to whether those who experience the crisis most harshly will find any respite soon. The outlook is bleak.

One might think that crises are a rupture with the normal order of things, but history shows that crises are endemic to capitalism, not contrary to it (Arrighi [1994] 2010; Arrighi and Silver 1999; Baran and Sweezy 1968; Foster 1986; Foster and Magdoff 2009; Marx [1867] [1859] [1894] 1978). In an environment of stagnating wages, rising unemployment, and a global system that increases the quality of life only for the few and not the many, it is necessary to ask what the long-term causes of the crisis are, for without deeper understanding, long-term causes beget long-term consequences.

Many theorists emphasize the necessity of taking a long-term view of capitalism, for such a perspective allows one to see the dynamism and changing nature of the system itself, the logics that underpin it, and how those logics are expressed in particular events (Arrighi 1999; 2009; 2010; Marx 1978; Schumpeter [1942] 1967). Regarding stark changes in the global economic system since the 1970s, David Harvey (1989) asks, “Can we grasp the logic, if not the necessity, of the transition? To what degree do past and present theoretical formulations of the dynamics of capitalism have to be modified in the light of the radical reorganizations and restructurings taking place in both the productive forces and social relations?” (p. 173). Now, in the midst of what is arguably the greatest economic crisis since the Great Depression, I ask: What can previous theories tell us about the current crisis? To what degree do these theoretical formulations have to be modified in light of this particular financial crisis?

While many studies deal with more proximate causes of the crisis such as the housing bubble and bust, failed accounting measures, or state reactions (Campello, Graham, and Harvey 2010; Chari, Christiano, Kehoe 2008; Chor and Manova 2011; Collander and Kiel 2009; Davidoff and Zaring 2009; Hellwig 2009; Ivashina and Scharfstein 2010; Laux and Leuz 2009; Obstfeld and Rogoff 2009; Shin 2009; Taylor 2009), a thorough understanding of such a widespread crisis requires a long-term historical perspective that ties together the numerous strands of history that most essentially created the crisis. Furthering such an understanding is the goal of this study. As Joseph Schumpeter ([1942] 1962) says, “First, since we are dealing with a process whose every element takes considerable time in revealing its true features and ultimate effects, there is no point in appraising the

performance of that process *ex visu* of a given point of time; we must judge its performance over time, as it unfolds through decades or centuries” (p. 83).

The intrinsic and deep-seated logics of capitalism such as competition, the profit motive, and unending growth hold relatively steady throughout the era of capitalism; they are essential parts of capitalism and help to make up its definition. These fundamental logics, however, function and are expressed in different ways throughout time and space. Underlying macrohistorical trends of accumulation are both consistent and mutable, complimentary and contradictory, creative and destructive. To understand their most recent expression – the financial crisis – requires a theoretical reach that grasps, not only the consistent deeper logics, but how these logics manifest themselves in contemporary society.

Put briefly, I argue that by taking a long-term perspective, something rarely done in the literature, we get a much different and richer view of why the crisis happened; we get a view that leads to further appreciation of major intertwined macro-historical transformations in the world system that led into the crisis. More specifically, I argue that while Arrighi’s ([1994] 2010) theory of systemic cycles of accumulation explains a number of trends leading into the crisis, an explanation of the processes of neoliberal globalization and financialization, as well as the changes they have brought about, is not only helpful, but necessary for understanding this crisis in its specificity. Integrating perspectives on neoliberal globalization and financialization with the theory of systemic cycles of accumulation and applying the resulting synthetic perspective to the financial crisis is the aim of this project and fills a wide gap in the current literature.

Arrighi’s theory suggests that world hegemons generally move through *systemic cycles of accumulation* beginning with a rise to world hegemony through historical circumstances that lead to (1) comparative advantages in the production of material goods, (2) the relocation of the financial center of the world to that nation, and (3) organizational changes specific to that world hegemonic nation that are then integrated by other nation-states. The outgrowth of such processual changes, Arrighi argues, is a new world hegemon that offers a system-wide answer to stagnation and creates a new worldwide paradigm of accumulation in the process.

Arrighi goes on to point out that as other nations start to utilize the new accumulation paradigm, the hegemonic nation's comparative advantage in the production of material goods wanes. Under a more competitive atmosphere, the hegemon's profits in the material sector fall relative to other nations and the hegemon begins to employ its new-found advantage in financial goods, shifting toward a more flexible form of accumulation: the accumulation of profit through finance (Arrighi [1994] 2010). With this argument in mind, I contend that a shift toward finance has been occurring in the US during the waning stages of its world hegemony. This shift is a long-term historical cause of the financial crisis. In the past the financialization of the world hegemon's economy was usually a relatively domestic change. But in the newest era, globalization and financialization have come together to create a feedback loop that pushes more and more economic actors to integrate finance into their accumulation strategies, rather than using finance as a mere facilitator. These twin histories have come together under the aegis of capitalism to instigate a transformation of the general logic of accumulation to include finance as a fundamental part of profit-making. Such changes are expressed through the fundamentally globalizing nature of US world hegemony and its transition toward finance.

Instead of instigating a singular worldwide shift in accumulation practices, as Arrighi's theory suggests, the US has led two worldwide paradigm shifts: (1) US free worldism and (2) neoliberal globalization and financialization. Whereas a shift toward financialization tends to occur only within the waning hegemonic nation, currently the general profit accumulation process is financializing due to the globalization process and a global stagnation crisis. Though material production is still a key piece of all world economies – especially those that are less advanced – finance is now an integral part of competitive accumulation strategies; finance is increasingly an intrinsic part of the production of finished material goods.

To be more specific, the globalization process and the extensive growth limit of capitalist social relations have led to more intensive forms of capitalist growth: the globalization of the production process and a concurrent tendency toward more flexible forms of accumulation within the entire system (Callinicos 2010; Foster and Magdoff 2009; Harvey 2005; Robinson 2004). In essence, the US has given two analytically separable

system-wide answers to accumulation issues rather than just one world-systemic transformation followed by national financialization.

Over the last few decades national economies have become more spatially integrated through the globalization of the production process itself (Robinson 2004). As such, a great number of links on commodity production chains are spread throughout the world, leading many corporations to shift from vertically integrated, nationally oriented models (US free worldism/national monopoly capitalism) to horizontally integrated production models that require highly mobile inputs (neoliberal globalization and financialization).

The shift toward these new forms of accumulation required an ideological shift to justify organizational and juridical changes to state policy (Gramsci [1957] 1971; Harvey [2005] 2007). Neoliberalism is the common term for this change and is theorized as a complex matrix of ideology and a practice. Briefly stated, neoliberalism consists of ideas and actions that lead to the deregulation of markets, the privatization of previously public arenas, and the discursive removal of the state from the economy. As Arrighi ([1994] 2010) and Gramsci ([1957] 1971) note, the difference between hegemony and dominance is consent, and consent for changes in production relations over the last three decades was created through promotion of the neoliberal ideology (see also Harvey [2005] 2007). The ideology of neoliberalism came initially from the US, but gained an almost universal status due to US world hegemony, the hegemony of positivism in scientific discourse, and the overarching processes of globalization and financialization. Thus, I expound upon the domestic rise of the neoliberal ideology and its export throughout the world by interrogating political and academic neoliberal discourses and showing how the two reinforce each other through a radical reinterpretation of core US political values and their application to the universalized economic sphere.

In terms of state practices, the shift toward neoliberal globalization and the subsequent global financial crisis is due, in great part, to changes in the US banking system. I discuss these changes through a brief but focused history of the banking system in the US since the Great Depression – what Crotty (2009) calls the creation of the *new financial architecture*. I use that history to show how organizational and juridical changes to the US banking system are surface manifestations of deeper capitalist logics that create an

environment that fosters crises. As the neoliberalizing and financializing transformations of ideology and practice in the US system were exported to the world through globalization and world hegemony, each historical strand reinforced the other, creating an intense feedback loop that has markedly changed processes of accumulation in the world system.

Additionally, I maintain that while derivatives are certainly a proximate cause of the financial crisis, a perspective that focuses only on their role in the crisis and fails to question the long-term consequences of their use misses the deeper changes that they might bring about. When derivatives are viewed in a wider perspective with an eye toward the past and the future, we see that they have great effects reaching far past the financial crisis. Some of these include: (1) intensifying a fundamental logic of capitalism: the logic of competition; (2) aiding capitalists by acting as tools in the search for more flexible forms of accumulation under the global financialization of accumulation processes; (3) performing the function of a supranational form of money in the absence of such an entity; and (4) changing the way we view ownership in a way that increases the intensity of competition in 21st century capitalism (Bryan and Rafferty 2006; 2009). All of these changes may have great and frightening effects on labor in the coming years. An analysis of these changes is therefore, not just fruitful, but absolutely necessary.

For these reasons, I contend that the histories of systemic cycles of accumulation, world hegemony, neoliberalism, globalization and financialization have all come together as different but mutually reinforcing causes of the financial crisis, causes that will have jarring repercussions for the future that reach far past the crisis itself. Arrighi's systemic cycles of accumulation thesis requires a deeper theoretical integration of the concepts of neoliberalism, globalization, and financialization to supply a rigorous perspective on the most recent global financial crisis. While the crisis is a colossal problem and watershed event, it is only a symptom of deeper transformations in the global economy as a whole. It is not this specific crisis, but its fundamental causes that must be dealt with to stave off future social, economic, and political problems.

Methods

I use a version of analytic induction as the method for this study. Regarding my use of concepts, Ratcliff (2002:1) paraphrases Znaniecki (1934) stating that:

Analytic induction can be contrasted with defining and using terms in advance of research. Instead, definitions of terms are considered hypotheses that are to be tested. Inductive, rather than deductive, reasoning is involved, allowing for modification of concepts and relationships between concepts occurs throughout the process of doing research, with the goal of most accurately representing the reality of the situation.

The main framing concepts of the study are world hegemony, neoliberalism, globalization, and financialization. Each concept is treated as a hypothesis to be inductively modified by relevant historical literature, all of which is centered around the financial crisis. As additional histories are introduced, each concept gains further depth from discussions of their relationships to each other and to new historical lines that their progenitors did not foresee.¹

To elaborate my specific method I paraphrase Ratcliff's (2002:1-2) list of steps in analytic induction and show how they are applied in the present study:

- 1. A phenomenon is defined in a tentative manner.** The phenomenon in question here is the most recent global financial crisis that stemmed from economic problems in the US, the arguably waning hegemon of the world system.
- 2. A hypothesis is developed about the financial crisis.** That the US is arguably the waning world hegemon and the primary country that caused the financial crisis led to a tentative hypothesis: Arrighi's ([1994] 2010) theory of systemic cycles of accumulation may help to understand the financial crisis because it explains how world hegemonic nations shift to finance as their hegemony wanes.
- 3. A single instance is considered to determine if the hypothesis is confirmed.** Arrighi uses three previous world hegemonies – the Genoese, the Dutch, and the British – as instances that provide the material for his theory of systemic cycles of accumulation. Thus, Arrighi completes steps four through six within his own research for each of those instances. However, his research includes the US as an instance only up to the time of his writing (1994), but does not include the most recent financial crisis. This leads to the need for the current study. My aim was to see if recent political-economic history focused on the crisis supports Arrighi's theory. Where the history does not support Arrighi's theory, new theories are integrated that help to revise the theory and the initial hypothesis.

¹ See the Appendix for more explanation of this method of conceptual analysis.

4. **If the hypothesis fails to be confirmed either the phenomenon is redefined or the hypothesis is revised so as to include the instance examined.** After reading more literature on the current crisis, it became obvious that Arrighi's theory alone could not fully explain the crisis, for many new happenings in the last few decades contributed to it, not only those dealt with in the systemic cycles theory.
5. **Additional cases are examined and, if the new hypothesis is repeatedly confirmed, some degree of certainty about the hypothesis results.** Instead of examining additional cases – there are no other world hegemon creating global financial crises at the moment – I examined other major lines of history in the recent political-economic literature that appeared to feed into the crisis. After much additional research, it became clear that the histories of neoliberalism, globalization, and 20th century financialization had to be integrated into the analysis to explain the crisis in a rigorous manner.
6. **Each negative case requires that the hypothesis be reformulated until there are no exceptions.** In this project, relevant historical lines not addressed by the initial hypothesis were treated as negative cases and integrated in to the analysis. I used a method of constant comparative analysis by acquiring data and formulating the aforementioned categories. When those categories became solidified, I synthesized the additional perspectives and updated the new synthetic perspective to include the history of the most recent financial crisis.

I have also created an appendix that lays out other theoretical and philosophical foundations of the study. While elaborating philosophical formulations does not coincide with the usual way of presenting social research, I feel that such work is absolutely necessary for justifying the methods of study as a whole. Readers interested in this analysis should see the appendix at the end of the study.

Chapter Summary

In the first chapter, I lay out Arrighi's theory of systemic cycles of accumulation. This theory acts as an expansive, centuries long backdrop to the current financial crisis, for the end of each world hegemon's systemic cycle usually consists of a shift toward financialization within that economy for greater profit-making and a resulting financial crisis. Contrary to Arrighi's theory, in the case of the US there have been two system-wide shifts. The first came about as an answer to waning British hegemony and shifted the world system's overarching form of accumulation from British free trade imperialism to US free

worldism. The second came about as an answer to the US's waning hegemony and is delineated as the shift from US free worldism to neoliberal globalization.

US free worldism was reinforced ideologically by Keynesian policy, which focused on creating demand in times of crisis through government spending and a focus on building national economies. As the US lost comparative advantage in the production of material goods, it deindustrialized (Bluestone and Harrison 1984) and shifted toward finance (Foster and Magdoff 2009), the area in which it had greater comparative advantage. As crises of accumulation hit in the 1970s and the US national economy lost material productive capacity, Keynesianism was mostly abandoned for the neoliberal economic theories that became popular in both politics and academia. One expression of these changes is the financial crisis.

In light of this second shift, the second chapter of the study deals with neoliberal globalization. I argue that neoliberal globalization is a complex matrix of ideology, economic practice, and political and institutional restructuring that makes up the US's new form of accumulation. This new form of accumulation is the US's answer to its waning hegemony and leads to a shift away from focus on the domestic economy toward a focus on profit-making through investment in globalized production. Furthermore, I add a new fold to the theory of systemic cycles of accumulation by positing that, rather than the US financializing within its own economy, the globalizing nature of the second epochal shift and the extension of capitalism to almost the entire world lead to the financialization of capitalism in general. The intensified competition that globalization and stagnation bring about increases the need for flexible forms of capital and labor leads to increased worldwide financialization, an increase in the use and change in the role of derivatives, and to the financial crisis itself.

In the second chapter I show how detrimental changes were justified to the US public by arguing that a radical reinterpretation of classical liberalism as a political philosophy was used alongside new anti-government economic theories to create the ideology of neoliberalism. This ideology gave the domestic consent necessary for the deindustrialization of the US economy and its restructuring toward finance and a more globalized, horizontally oriented, and flexible form of production – a form of production

that has hindered the growth of real wages for the vast majority of the US population and benefitted only those at the top. Neoliberalism as an ideology and practice is exported to other countries through US world hegemony, globalization, international financial institutions, and the hegemony of positivism as a scientific method. Put bluntly, the ideology of neoliberalism legitimates domestic and global financialization, both of which led to the financial crisis.

In the third chapter I outline the growth of the new financial architecture² of the US over the 20th century. In the wake of the Great Depression a shadow banking system was created to sidestep regulations and keep up the rate of profit. Banks and investors had higher demand for liquid capital, which was necessary to keep returns high in the environment of waning comparative advantage in the productive sector and the globalization of the economic system. As regulatory and institutional structures changed to benefit the financial sector, the US economy continually based itself on speculative bubbles. As the tech/dot-com bubble burst, finance and speculation transferred over to the housing bubble that had been brewing for years.

I contend that many social science perspectives on derivatives are flawed and must take a deeper look at derivatives in 21st century capitalism. New financial instruments were thought to be indomitable barriers against risk due to recent economic theory, but the anti-historical nature of these theories led to their inability to foresee the problems that a panic would bring. In times of low liquidity, like when markets get shocked by bursting bubbles, derivatives' value lowers immensely and they are not able to be sold easily in markets – something most risk theories did not comprehend. Though derivatives can perform risk limiting functions for investors, under the new financial architecture, incentives and practices became so flawed and perverse that derivatives could no longer limit risk. Leveraging, perverse incentives, and the inability to correctly price financial instruments due to opacity from the “slice and dice” and “originate and distribute” models helped to create the most far-reaching financial crisis since the Great Depression.

However, it is doubtful that derivatives will be removed from the global financial system due to their role in the crisis, for they perform fundamental roles in facilitating the

² The “new financial architecture” is Crotty’s (2009) term.

logics of capitalism by increasing competition and acting as a global form of money in the absence of such an entity. Following Bryan and Rafferty (2006), I theorize that as nation-state money loses its value as the most fundamental form of currency, derivatives contracts will become more important. Their performance in the functions of binding and blending capital, its attributes, and time will prove more and more necessary as globalization moves forward. As an instrument of international trade, derivatives will only become more and more prominent as tools for navigating the global financial economy. But, derivatives also increase competition between corporations and, taken along with the growing volatility from more flexible production processes, they severely promote further downward pressure on labor – a pressure that may not be sustainable in the long run.

In summation, I start with Arrighi's theory of world hegemony and systemic cycles of accumulation and then integrate other critical concepts that frame the crisis, such as globalization, neoliberalism, and financialization, showing how each of these concepts adds new layers and gives different turns to the analysis as a whole. I show that, rather than conflicting with each other, these conceptualizations focus on different aspects of the crisis and can come together to give a rigorous theoretical and empirical view of how and why the crisis happened. This project also updates and transforms these related theories by synthesizing and reinterpreting them through a lens focused on the recent history of the financial crisis. The end result is an analysis that, on one hand, shows how a number of different but interrelated histories of social relations came together to create the crisis, and on the other, points to deepening contradictions in the political-economic system and how they may manifest in years to come.

The crisis is, in essence, a watershed moment and a partial coming to fruition of numerous historical lines in the US and global political economy. This "coming to fruition," though, is only a moment in the process of history and, rather than alleviating tensions, actually reinforces many of them. Through an analysis of fundamental historical lines leading to the financial crisis and how they relate to and reinforce each other, I hope to give a cogent view of the crisis itself and the broader transformations that created it. Most importantly, I hope to shed light on the effects such changes may have on the people who continue to live and struggle in our global political economy.

These changes are both contradictory and complimentary. They move through decades and centuries, peoples and nations. They move through the history of the entire world.

Systemic Cycles of Accumulation: A Macrohistorical View of the Crisis

Giovanni Arrighi's book *The Long Twentieth Century* ([1994] 2010) outlines and elaborates a thorough long-term history of the concurrent evolution of capitalism and the nation-state system. Through a number of works he has created a rigorous theory of history focused mostly on Europe that spans centuries, which, we will see, gives us a long-term perspective on shifts in world hegemony and the crises that go along with them (Arrighi [2007] 2009; [1994] 2010; Arrighi and Silver 1999). Working in the tradition of world systems theory set out by Immanuel Wallerstein (1974; 1983), Arrighi shows how the nation-state and capitalism grew up together from the inception of capitalist social relations and city-states in the 15th century to the worldwide expansion of capitalist markets and ubiquity of the nation-state in the late 20th century. Through elucidating the systemic cycles of accumulation that world hegemons undergo over their long centuries, Arrighi elaborates both the transhistorical and historically specific aspects of such cyclical shifts. Thus, his theory is dynamic, for it shows that while things change within a relatively consistent system (systemic cycles of accumulation), it also shows that changes happen both within the system and *to the system itself*.³ In other words, the cycles do not make up an objective or universal backdrop and are unique in certain ways.

³ We can see here the affinity between the work of Arrighi and that of Joseph Schumpeter. Both vociferously promote the idea that capitalism is inherently dynamic. For example, Schumpeter ([1942] 1962) asserts that “the essential point to grasp is that in dealing with capitalism we are dealing with an evolutionary process.... Yet that

Systemic cycles of accumulation promote *tendencies* within the political economies of nation-states that push them to move among certain routes; these are not ironclad laws that follow inevitably from the theory.⁴ World hegemonic power shifts from one nation-state to another within the system and each nation-state uses both progressive and regressive tactics for accumulation, which change the equation of the system as a whole. Each nation-state internalizes production costs and accumulates in its own unique way, reformulating global social relations along its new developmental path. Thus, understanding the processes, logics, and dynamics of systemic cycles of accumulation over the *long durée* is necessary for understanding the most recent global financial crisis, for crises of accumulation are consistent parts of such systemic cycles.

This chapter gives long-term context to financial crises in the capitalist system through framing the overarching processes that lead to the financialization of world hegemonic national economies, for financialization is the usual domestic remedy for crises of accumulation in the productive/material sector and is a consistent indicator of a fall in world hegemonic power (Arrighi 2010). Such financialization has certainly occurred in the US throughout the last few decades of the 20th century⁵ (Arrighi 2007; 2010; Callinicos 2010; Davies 2010; Financial Crisis Inquiry Commission 2011⁶; Foster and Magdoff 2009).

In attempting to apply Arrighi's theory to the current crisis, we will find that the limitations he puts on his analysis open gaps for further areas of inquiry and point to specific structural transformations of the global economy over the last few decades that helped to create this particular financial crisis. So, in addition to Arrighi's argument, which suggests that only the falling world hegemon financializes, I argue that the US has instituted a second cycle of accumulation in its waning phase of hegemony that pushes numerous actors in the global economy to shift toward finance.

fragmentary analysis which yields the bulk of our propositions about the functioning of modern capitalism persistently neglects it" (p. 82).

⁴ See the Appendix for further explanation of tendencies and laws within social reality.

⁵ Even if one does not agree with Arrighi's overarching theory, it has been empirically proven by many across the ideological spectrum that the US economy has shifted toward finance (FCIC 2011; Foster and Magdoff 2009; Davies 2010). Moreover, Arrighi's theory is used in this study as a guide and a facilitator, not as an absolutely necessary foundation for the study as a whole. In other words, the findings in this study are supported by empirical data and theories that are outside the scope of Arrighi's work.

⁶ Hereafter cited as FCIC 2011.

Viewing the financial crisis through Arrighi's lens gives a general, macro-historical understanding of transhistorical financialization. More importantly though, when this theory is applied to the current crisis, its limitations lead to questions and lines of research that allow us to get at other changes in capitalist social relations over the last few decades that lead to an understanding of this crisis *in its historical specificity*.

In this section I will show how world hegemony – a fundamental organizing concept in Arrighi's theory – frames systemic cycles of accumulation over long centuries and pushes nations participating in the world economy to tend toward certain accumulation strategies at certain times. Arrighi criticizes previous studies for their conflated definitions of hegemony and their emphases on studying changes happening within an invariant system, rather than studying changes happening within a qualitatively *changing* system. In his book *The Long Twentieth Century*, Arrighi ([1994] 2010) lays out his theory using an updated Marxian analysis that chronicles the rise and fall of hegemonic powers throughout the history of capitalism, as well as the crises that lead to changes in accumulation strategies. But what exactly is hegemony?

According to Arrighi, "the concept of 'world hegemony' ... refers specifically to the power of a state to exercise functions of leadership and governance over a system of sovereign states" (2010:28). World hegemony therefore utilizes the world system as the level of analysis and posits the nation-state as the main actor within that system. Arrighi goes on to state that this notion of hegemony is quite different from mere dominance, for according to the Gramscian notion of hegemony, it is expressed at the international level through both domination *and* intellectual and moral leadership (Gramsci [1957] 1971). Gramsci's ideas of domination and intellectual/moral leadership are analogous to Machiavelli's two conceptions of power in practice: coercion and consent. According to Arrighi, "Coercion implies the use of force...; consent implies moral leadership" (2010:29). Arrighi then describes the ways that nation-states become world hegemonic through exercising not only dominance through coercion, but also by exercising power through ideological consent and leadership. We will see later that the ideology of neoliberalism plays an integral role in the creation of domestic and worldwide consent for US policies that led into the financial crisis.

To hone the definition of hegemony further in contrast to dominance, dominance rests mainly on coercion and hegemony is that “*additional* power that accrues to a dominant group by virtue of its capacity to place all the issues around which conflict rages on ‘universal plane’” (Arrighi 2010:29; emphasis in original).⁷ More specifically, world hegemony includes not only dominance, or an increase in a state’s power relative to other nations, but the ability of a state to lead “the *system* of states in a desired direction...(which) is perceived as pursuing the general interest” (Arrighi 2010:30; emphasis in original). A dominant state can also lead by “drawing other states onto its path of development,” but this form of leadership does not necessarily fall under the concept of hegemony. A state can also be world hegemonic if it can claim (credibly) that it is the guiding force of rulers’ collective powers over subjects or that the expansion of its power relative to other states contributes to the general interest of subjects from all states, as occurred in the transition to US hegemony (Arrighi 2010). In essence, world hegemony means that the hegemonic power is perceived to act in the general interest of either the power elite in multiple

⁷ It is helpful to state that the concepts of dominance and hegemony are dialectical in nature and therefore contain tensions and contradictions within them. The two differ in some respects as mentioned above, which leads to the need for analytical separation, but they are also not reducible to wholly separate conceptions *in theory or practice*. In the vocabulary of internal relations philosophy, the concepts themselves are ontologically related to each other internally rather than externally (Ollman 2003); one cannot be fully defined without reference to the other. Additionally, in practice the two coexist at the same time, but in analytically separable areas, exemplified by the fact that the US still holds on to some of its hegemonic properties – it is seen by many as the legitimate world leader, especially in terms of economic organization – but at the same time the US increasingly exerts its power and sheer dominance within the world system through war (Arrighi 2007). The US’s shift toward unilateral military action in the early 21st century, along with other states’ negative reactions to it, shows a hegemon slipping toward mere dominance (Arrighi 2007; Harvey 2005; 2007a; 2010).

The coexistence and tensions between these two theoretical terms are due in part to the fact that world hegemony and world dominance are abstract analytical categories applied to occurrences that are *ongoing historical processes*. Since the processes themselves are contradictory and are held in tension throughout the historical process, the theoretical terms used to describe them must also be formulated as such. Put more simply, these terms are necessary abstractions that are used to describe concrete reality. Concrete reality exists as a multiplicity of internally related gray areas rather than as externally related phenomena that can be divided by a hard line (Ollman 2003; Marx 1978; 2003; 2009; 2010). Using dialectical conceptualizations such as hegemony and dominance, Arrighi’s abstractions reflect reality more closely than bounded abstractions. As we will see later, hegemony and dominance can be used on a domestic level of analysis as well, though they are made more robust when viewed on the domestic level and then raised to the world-systemic level. See the appendix for more information on abstraction and dialectics.

countries or in the general interest of subjects across national borders; it allows that nation to put all conflict onto a singular universal plane.⁸

Moving further, the claim of a world hegemonic state to be acting in the general interest is usually only credible under conditions of *systemic chaos* (Arrighi 1999; 2010). In contrast to the concept of ordered anarchy, defined as organization under “the absence of central rule,” the terms chaos and systemic chaos

refer to a situation of total and apparently irremediable lack of organization. It is a situation that arises because conflict escalates beyond the threshold within which it calls forth powerful countervailing tendencies, or because a new set of rules and norms of behavior is imposed on, or grows from within, an older set of rules and norms without displacing it, or because of a combination of these two circumstances. As systemic chaos increases, the demand for “order”... tends to become more and more general among rulers, or among subjects, or both. Whichever state or group of states is in the position to satisfy this system-wide demand for order is thus presented with the opportunity of becoming world hegemonic. (Arrighi 2010:31)

Now, to bring ourselves up to speed in understanding the current crisis, we must first further understand some pertinent aspects of world hegemonic shifts that have occurred in the past, for these shifts show both transhistorical and historically specific transformations of accumulation processes and, along with Arrighi’s stated limitations, lead to lines of inquiry that frame the remainder of the study. Thus, we will now turn to understanding a wide view of changes in state formation and accumulation strategies occurring over the last few hundred years that led to the US’s cycle of world hegemony, the waning of which created the most recent financial crisis.

The birth of the capitalist system began during the decay of medieval Europe and the creative destruction of feudal social relations (Arrighi 2010; Schumpeter 1962). It is inextricably tied to the creation of the modern nation-state system at the Peace of Westphalia of 1648. However, Europe invented the modern state twice: once through the city-states of the 15th century Italian Renaissance and again during the 17th century terminal crisis of the medieval system of rule (Arrighi 2010).

⁸ The term hegemony, as used in this study, should not be taken in a universal, absolute sense. When a nation is termed hegemonic, it does not exercise absolute power over all nations, but does have far more relative power and influence over the world system than any other country.

Accordingly, the capitalist system's first full iteration as a systemic cycle of accumulation under a state-led hegemony was predated by a more transitional system of accumulation under four pre-modern city-states: Venice, Florence, Genoa, and Milan in the 1400s. This pre-modern political/economic/social system sprang from and operated within the medieval European system of rule, but held within it the germ of that system's demise. To paraphrase Arrighi (2010), some features of this pre-modern system include:

First, a merchant capitalist oligarchy held state power and used a system of war- and state-making which focused on profit as the main end of the exercise of power. This use of state power for gaining profit, as opposed to gaining territory, exemplifies the capitalist logic of power as opposed to a territorial logic of power. We will return to these concepts shortly. Second, three levels of a balance of power played key roles in allowing for the creation of a capitalist system within the medieval system: one consisting of a balance of power between the medieval political rulers (the pope and the emperor), a second balance of power between the four city-states themselves, and thirdly, a balance of power between the emerging dynasties of Western Europe. This balance of power is a key feature of the evolution of the capitalist system, for it allows the capitalist logic to trump the territorial logic by lowering protection costs and allowing states to focus on the economy. Third, these city-states managed to turn their protection costs into revenues by developing wage-labor relations that paid soldiers, who then spent their money domestically, increasing tax revenues that flowed back into the state. Fourth, the Italian capitalist city-state rulers created networks of residential diplomacy that gave them the knowledge they needed to turn the balance of power in their favor. By knowing the capabilities and ambitions of others, the capitalists of Italy were able to monitor other political leaders and manipulate the balance of power for their own profit-oriented ends (Arrighi 2010).

These proto-features of the capitalist system bring to the fore two interrelated concepts that must be examined before moving any further: the capitalist logic of power and the territorialist logic of power (Arrighi 2010). The rulers of these four Italian city-states were some of the first examples of capitalist rulers. They ruled not for territory or political clout but for money alone. Gaining territory and political clout may have been a part of their goal, but primarily as a means to acquire more money. This is one of the first

ideological shifts that helped to create capitalism as we know it today, and we will see later that the capitalist and territorial logics still figure very much into contemporary life, especially regarding the shifts from British “free trade imperialism” to US “free worldism” and the more recent neoliberal to neoconservative shift in US policy (Arrighi 2007; 2010; Harvey 2007).

One can easily see the differences between the two logics when Arrighi (2010:34-5) paraphrases Marx’s general formula of capitalist production:

Territorial Logic: (T-M-T’) A territorial state leader uses money or economic command (M) as a means to acquire more territory/territorial power. Their primary goal is acquiring more territory; the means by which they do so is money.

Capitalist Logic: (M-T-M’) A capitalist leader uses territory as a means to acquire more money. Their primary goal is the acquisition of more money, not more territorial power.

Arrighi (2010), with the use of Giddens’ (1987) definition of a state as a container of power, says it nicely:

Territorialist rulers tend to increase their power by expanding the size of their container. Capitalist rulers, in contrast, tend to increase their power by piling up wealth in a small container and increase the size of the container only if it is justified by the requirements of the accumulation of more capital. (P. 7)

Now, we can see how the four Italian states, although holding power over much smaller territories than many other leaders, managed to accumulate great power within very small containers using a capitalist rather than a territorial logic, a factor recurring again during Britain’s hegemony. With the decline of the medieval system of rule over the next two centuries came a change in the balance of power and increasing systemic chaos.

A lacking balance of power in the 16th and 17th centuries led to the Thirty Years’ War, raising protection costs and putting pressure on peasants, which contributed to the numerous revolts of the 17th century (Arrighi 2010). In this context then, there was a newfound and general-systemic need for sovereign elites to regain power over their subjects. A new system of rule giving answers to these problems was found in the birth of the modern nation-state at the Peace of Westphalia in 1648.

The medieval system of rule had reached its limits and a new system giving power to sovereigns over their own territories and subjects was needed to restore some semblance of peace to the world. This system located power in the leaders of nation states, rather than in an overarching suprastatal system of a worldwide market, a trait of both US accumulation strategies that will be elaborated later. This new system had a particular beneficiary in the Dutch state, which would soon rise to hegemony, for the Dutch “had a strong common interest with the emerging dynastic states in the liquidation of the claims of pope and emperor to a suprastatal moral and political authority as embodied in the imperial pretensions of Spain” (Arrighi 2010:46). The Dutch, rather than the Venetians a few hundred years earlier, managed this because they had control over financial networks, not only commercial networks, their interests clashed very fundamentally with the medieval system, they had much better war-making capabilities, and they had much better state-making capability than the Venetians. In other words, the Dutch utilized a shift toward a more territorialist logic of power to rise in the newly created modern state system. These state- and war-making capabilities, forged from the rationalization of military techniques and the struggle against imperial Spain, gave the Dutch great advantage, including the ability to deal with European power struggles and, most pertinently, the ability to internalize protection costs within the state apparatus (Arrighi 2010). The internalization of the costs of accumulation, we shall see, is a fundamental aspect of each successive hegemon. Although the Dutch benefitted from the new Westphalian system initially, the British and French powers soon rose in relative power and fought to incorporate the United Provinces under their domains.

The usual first phase of hegemonic succession consists of an attempt to integrate the previous world power into the successive power’s territorial domain (Arrighi 2010). Although France and England failed at their attempts to integrate the Dutch, the ensuing struggle for world supremacy existed mostly between these two up-and-coming powers. A struggle for the acquisition of capital accumulation networks is the fundamental characteristic of the second phase of the succession of a world hegemon. The third phase entails systemic chaos and the subsequent system-wide answer by the new hegemonic power. The systemic chaos of this phase was brought on in part by the revolution of the

American colonies in 1776 and the French Revolution of 1789. These revolts from below helped to create the vacuum of power that led to Napoleonic Imperial France. Britain's leadership against these imperial ambitions provided part of its answer to systemic chaos, but its reorganization of the world system into what Arrighi (2010) calls *free trade imperialism* under the newly formed classical liberal ideology created the new order that would characterize the system for years to come. The liberal ideology – a rebuttal of feudalist social relations – gave an answer to some problems in the current system by promising increasing freedom, wealth, and dominion over private property to the proletarian, democratized subjects of multiple nations, at least nominally. This ideology linked the well-being and wealth of subjects worldwide to the wealth of British nationals and created the system-wide consent necessary for British world hegemony (Arrighi 2010).

The Dutch rose to hegemony by helping grant authority to the emerging nation-states, rather than to the suprastatal moral-political authority of Imperial Spain and the Pope. The British rose to hegemonic power by nominally relocating power to some people through imposing classical liberalism and free trade imperialism. Free trade imperialism, a new synthesis of the capitalist and territorial logics, was characterized by England's use of settler colonialism and capitalist slavery, as well as a push for economic nationalism (Arrighi 2010). As Arrighi (2010) states:

A key factor in the rise of a new world hegemonic power consists of a new ability to internalize the costs of capitalist accumulation. The Dutch were able to internalize protection costs, a feat not accomplished by the Genoese due to their lacking state military power. The British internalized production costs through industrialization and inflow to the domestic economy, bringing productive activities under their organizational structure. In the prior two hegemonies, productive actions were mostly accomplished by places lower on the commodity chain while those hegemons focused mostly on trade and finance; Britain managed to incorporate trade and finance along with a more localized productive capacity through the industrial revolution. (P. 377)

Free trade imperialism was a new and powerful fusion of the capitalist and territorial logics of power that both reinforced and went beyond the Westphalian system. By fusing the two logics through colonial conquest and expropriation of surplus value from the

colonies the British, supported in part by the newly fashioned liberal ideology, created a new global order in which the laws of the world market superseded the sovereignty of nation-states. However, in contrast to the future American “free” market system, the British claimed an almost unilateral authority over and advantage within markets (Arrighi 2010).

US Free Worldism

After 1870, England began to lose its control over both the European and the world balance of power, due mostly to the rise of Germany and the US. German leaders pushing territorial expansion on the European continent threatened the local balance of power, but it was the growing powerhouse across the pond that became the greatest threat to British hegemony. The dynamism and new arena of the US market put it in a much better place than Germany to supersede the wealth and market domination of England. This dynamism was characterized by the vast expanse of its territory, its natural resource endowments, and a protectionist government policy that kept the domestic market closed from foreign goods but open to foreign capital and labor (Arrighi 2010). Furthermore, Weber’s Protestant ethic was arguably embodied by the leaders and peoples of the US, leading to a capitalist ideology and practice based on working toward limitless profits (Weber [1905] 2002). The outpouring of resources from Europe to the US gave the country a great advantage in the world-system and the insularity of the continent shielded it from the systemic chaos and World Wars that were soon to follow (Arrighi 2010).

The US also took great advantage of the decaying British system of free trade imperialism, incorporating its working aspects and creating new answers to prior contradictions. The exclusion of non-western peoples and property-less masses from the British system fed the new organizational structure spearheaded by the US. This new system was not focused only on Europe or the US, but attempted to extend sovereignty and private property rights to the entire world, at least discursively. On the surface, this entailed massive decolonization and an effort toward anti-imperialism, helping to foster general ideological consent in the world. The extension of these rights to the whole of the globe was not only an attempt to extend freedom to others, but engendered a way for the US to open up the world markets, which, due to its advantages, favored the relatively newly

formed country considerably. As will be shown later, this spread of world markets is an extensive growth of capitalist social relations (Robinson 2004). The movement was not primarily economic, as it was for the British, but encompassed revolutionary political action in that it promised new values and rights to the subjects of the world (Arrighi 2010). We will later see how the unintended consequences of this political ideology have manifested themselves in the financial crisis.

The supersession of British free trade imperialism by US free worldism took the form of a dialectical movement, much like many of the other processes of hegemonic transition. This dual movement consisted of the reformulation of the Westphalian order, but left behind the overtly imperial and unilateral aspects of the previous hegemon. Through its new systemic order it was able to give system-wide answers to the system-wide problems affecting others in the world, in some degree through promoting the rights of subjects from all countries to consume more and more goods (Arrighi 2010). The British form of classical liberalism extended such rights mainly to Europeans, but the US's first systemic answer relied heavily on a discursive spread of those rights to people all over the world, integrating them into capitalist markets as actors.

Another significant and evolutionarily cyclical aspect of the new hegemony is that the US was able to integrate yet another cost of accumulation: transaction costs. Though the Dutch incorporated protection costs and the British incorporated both protection and production costs, the US was able to incorporate both along with transaction costs; in other words, the US was able to organize and control "the markets on which the self-expansion of its capital depended" (Arrighi 2010:376). This internalization of transaction costs was also furthered by the new managerial capabilities of US corporations (Baran and Sweezy [1966] 1968; Sweezy 1942; Foster and Magdoff 2009). Though these entities were not wholly new in the capitalist system, this was the first time that a vertical integration model was carried out on such a grand scale. Bringing many enterprises in a commodity chain under one nationally based organizational structure led to lower transaction costs, greater economic calculability, and greater efficiency (Arrighi 2010). In addition, the proclivity for US corporations to spread their wares throughout the world, along with innovations in transportation and communication technologies, further fed the organizational abilities of

these corporations and pushed the breadth of the capitalist economy toward its extensive limits in the latter decades of the 20th century.

The historically specific place of the US in the global order gave it the advantages necessary to answer the problems of the system and become the world hegemon. Through access to a vast amount of natural resources, a new vertically integrated organizational structure, an ideology that discursively gave rights to people all over the world, and the shattering of other world powers' economies in the wake of the Second World War, the US unquestionably ascended to world hegemony.

Neoliberal Globalization and Financialization

After the post-war upswing of the US economy in the 50s and 60s, the tendencies of the capitalist system toward stagnation began to set in.⁹ As US manufacturing jobs were exported to nations with lower labor costs in the 1970s through the newfound organizational abilities of transnational corporations, the bifurcation of wealth between the domestic bourgeoisie and proletariat lowered domestic demand (Bluestone and Harrison 1984).

Some changes in the American labor force helped to stem the oncoming demand problems, at least for a time. The entrance of more women into the paid labor force and the rise in working hours in general gave US families more ability to stay above water. In the short-run, low interest rates and increased debt for US families further contributed to

⁹ Another factor consonant with prior world hegemonic shifts is the fact that the previously mentioned historically specific factors led to the rapid growth rate of the US, *not aspects intrinsic to the capitalist market system itself*. In Foster and Magdoff's words, "stagnation (is) the *normal state* of the capitalist economy, barring special historical factors" (2009:128, emphasis in original). According to Foster and Magdoff, other historically specific factors that contributed to the rise of the US political economy after World War 2 and the so-called golden age of American capitalism are:

- 1) The buildup of consumer savings during the war
- 2) A second great wave of automobilization in the United States (including the expansion of the glass, steel, and rubber industries, the construction of the interstate highway system, and the development of suburbia)
- 3) The rebuilding of the European and Japanese economies devastated by the war
- 4) The Cold War arms race (and two regional wars in Asia)
- 5) The growth of the sales effort marked by the rise of Madison Avenue
- 6) The expansion of FIRE (finance, insurance, and real estate)
- 7) The preeminence of the dollar as the hegemonic currency (2009:128).

economic stability. The growing debt of everyday Americans stimulated the economy in general and later came to be an integral part of accumulation and distribution processes.

These concrete historical factors, along with many political-economic theoretical shifts, helped to set the stage for the neoliberal policy shifts of the late 1970s. The failure of the Bretton Woods system removed the US dollar from the gold standard allowing for floating exchange rates and greater profit-making capabilities in the trade of currencies. Other factors contributing to such shifts were the oil crisis of the 70s and the signal crisis of US hegemony: its failure to win the Vietnam War.

The shift of labor and capital away from what used to be highly profitable material industry toward finance, real estate, consumption-based media (advertising), and service industries, in conjunction with the loss of jobs to cheaper labor from abroad, left US capitalists with an advantage in financial, non-material industries, an organizational knowledge of transnational corporations, and an uncanny scientific ability to create consent through propaganda. The scope and goals of the International Financial Institutions (IFIs) shifted toward US-led “development” oriented banking, loaning money to peripheral countries and imposing strict structural adjustment policies (SAPs) to ensure their repayment. These SAPs forced countries to deregulate trade and open their markets to pay back loans and compete with the rest of the world in a race to the bottom (Harvey 2007).

In Marxian terms, capitalist leaders in the US were able to turn the terms of the economy back into their favor by shifting from the capitalist logic based on the production of material commodities for profit (M-C-M') to a financialized logic based on the nominal creation of profit through finance (M-M'). The ideological backing for this domestic and world-systemic shift was created by a powerful mixture of reinterpreted economic theory and a harkening back to core US political values, although in an arguably bastardized sense.

The aforementioned factors led to the financialization of the US economy but also to the financialization of the global economy in general, as well as the export of neoliberalism as an ideology and practice. These changes make up the foundations of the second US-led world-systemic shift: neoliberal globalization and financialization.

A New Research Agenda

Through Arrighi's systemic cycles of accumulation perspective we have put the current financial crisis into the long history of capitalism and its maturation alongside that of the nation-state. Arrighi's theory also provides reasons for the US's recent proclivity for finance. Due to its explicit limitations though, the theory of systemic cycles of accumulation begins to lose its utility when applied to the current financial crisis.

Arrighi purposefully limits his study to very macro-oriented changes in capitalism as a whole, especially with regard to temporal and geographical scope. This allows him to find such general consistencies in the long term processes of capitalist accumulation strategies. However, he states that:

This reconstruction of capitalist history has its own limitation. The notion of systemic cycles of accumulation... derives directly from Braudel's notion of capitalism as the top level in the hierarchy of world trade. Our analytical construct, therefore, focuses on that top layer and offers a limited view of what goes on in the middle layer of market economy and the bottom layer of material life. (Arrighi 2010:25)

Arrighi goes on to state that his construction is

partial because it seeks some understanding of the logic of the present financial expansion abstracting from the movements that go on under their own steam and laws at the levels of the world's market economy and of the world's material civilizations. It is somewhat indeterminate for the same reason. The logic of the top layer is only relatively autonomous from the logics of the lower layers and can be fully understood only in relation to these other logics. (Arrighi 2010:25-27)

Arrighi acknowledges his limitations, but more salient for the present study, these limitations specify gaps that lead to a more rigorous understanding of the most recent financial crisis *in its specificity*. By acknowledging and attempting to fill these gaps, we find that we should also look to the middle layer of the financial market economy for a more pointed view of the crisis. Arrighi's explicit limitations lead to further interrogation of: (1) a second shift in the general capital accumulation process called neoliberal globalization and financialization, (2) a need to elucidate the ideology that legitimates this epochal shift and the theories that support it, and (3) a construction of the history of changes to market

processes, political and economic policy, and the financial architecture within the US that have led to the greatest global financial crisis since the Great Depression.

The mixture of US world hegemony, the globalization and financialization of accumulation and distribution processes, the neoliberal ideology, and structural changes to the US banking system have led to the financial crisis *and* to general systemic transformations of the capitalist world system. While some of these issues may be outside the scope of Arrighi's work, such changes make up integral pieces of the puzzle of the most recent financial crisis and must be interrogated more fully. Arrighi is attempting to study world hegemonic shifts on a grand scale and keeps his scope at a world-system level. Epochal shifts under the scope of Arrighi's theory occur through state-centric world hegemonic shifts and he gives a more general view of structural changes than what is necessary for a full understanding of the financial crisis, which is arguably both a domestic *and* a world-system level phenomenon. By taking a slightly different tact through changing the scope of these abstractions, we see that a second worldwide shift has occurred within the long US century. Also, the shift toward domestic hegemony of neoliberalism in the US had to be justified by changes in ideology, for the deindustrialization and financialization of the US economy arguably do not benefit most people in the US (Bluestone and Harrison 1982; Harrison 1997; Foster and Magdoff 2009; Crow and Albo 2005). The ideological support came from radical re-imaginings and recombinations of academic economic theory and core US political values (Albritton 2007; 2009; Callinicos 2010; Duménil 2004; 2005; 2011; Duménil and Lévy 2005; Harvey 2007a; Jessop 2002; McCarthy and Prudham 2004; Munck 2005; Palley 2005). These two lines of interrogation make up the next chapter of the study. The other line of interrogation deals with practical changes in the US's financial structure since the Great Depression: the creation of the "new financial architecture" (Crotty 2009) and the rise of financial derivatives as facilitators of globalization and financialization (Bryan and Rafferty 2006; FCIC 2011). This line makes up the third chapter of this study and includes the changing laws, institutional structures, and practices of banks and other financial actors since the Great Depression and the changes that derivatives make to capitalist social relations.

Thus, Arrighi's long-term, macro-oriented level of theoretical analysis is a starting point for understanding the globalization and financialization of accumulation processes, the role of neoliberal ideology in justifying changes to economic practices, and the domestic changes in the US that led directly into the crisis. We will see that each of these overlapping processes buttresses and reinforces the others and, when moving together through history, push forth transformations of the capitalist system that will have effects for years to come. Analysis of these processes gives a deep and far-reaching understanding of the financial crisis, for each perspective grants primacy to differing aspects of 21st century capitalist social relations.

Neoliberal Globalization and Financialization

The move to US free worldism was not the only epochal change to happen within the US's long century. A second epochal change has happened since the crises of the 1970s: a shift toward neoliberal globalization and financialization (Foster and Magdoff 2009; Munck 2005; Harvey 2007a; Robinson 2004; Rowland 2009; Saad-Filho and Johnston 2005; Thorsen and Lie 2007). This change is in great part a reaction to the falling rate of profit in the productive US economy due to increased competition from abroad (Arrighi 2007; 2010; National Intelligence Council 2010; Foster and Magdoff 2009). As US advantage in the productive/material sector waned and the country ran upon stagnation problems, its economic practices shifted toward more mobile forms of accumulation and capital to combat that stagnation. We saw in the last chapter that the contradictions of capitalism lead to stagnation and new logics of accumulation are provided that give system-wide answers to system-wide problems. Such answers though, do not last forever. Solutions to previous problems are only partial and hold within them their own contradictions. As historical processes transform and mature, their contradictions come to a head, leading to periodic crises. The financial crisis is a symptom of the maturation of a number of different historical lines that make up the US's answers to the stagnation problems of the 1970s. The financial crisis is a glaring example of a crisis of accumulation stemming from the US's attempts to forestall its tendency toward stagnation (Foster and Magdoff 2009).

To get at the long-term happenings that led to the financial crisis, I will first reinterpret Arrighi's nation-state-centric world hegemonic epochs into four epochs that are less nation-state centric, adding neoliberal globalization and financialization as another worldwide transformation of capitalism happening under the US's reign as world hegemon. The shifts from the third to fourth epochs of capitalism preempted the financial crisis and when their contradictions matured led into the largest and most pervasive financial crisis since the Great Depression. Globalization, financialization, and neoliberalism emerged together historically and mutually reinforced each other throughout the end of the 20th century and the beginning of the 21st, leading to the crisis. Through a reinterpretation of Arrighi's epochs we will see how capitalism grows both extensively and intensively, though it has now reached its extensive limits (Robinson 2004). These extensive limits lead capitalism to grow more intensively by embedding more and more arenas into the competitive market logics of capitalism, spreading commodity chains across the world, globalizing production processes, and integrating new actors into finance to combat stagnation and participate in the new logics of capital. Instead of the growth of a domestic form of financialization as Arrighi's theory would suggest, financialization spreads beyond US borders and facilitates the newly globalized forms of accumulation and distribution. Along with innovations in communication and transportation technologies, financialization creates a dynamic era of advanced capitalism in which overaccumulation crises and their remedies compound to create large-scale global financial crises.

These forms of accumulation are spread through the matrix of neoliberalism and US world hegemony (Harvey 2007a; Colás 2005; Saad-Filho and Johnston 2005; Thorsen and Lie 2007). Thus, neoliberalism as a historical matrix is interrogated under the lens of ideology critique. Specifically, we will see how neoliberalism has been justified through discursive means as an ideology in the US, for the political and economic theories that came to prominence gave legitimacy to the practices and structural changes that led to the financial crisis, as well as to the export of neoliberalism abroad.

US free worldism was very advantageous for the US in the years following World War II. The US had great advantage in the production of material goods at that time relative to other countries due to its beneficial place in history. Thus, pushing for the expansion of a

worldwide market with low barriers to trade allowed the US to compete with other nations while it had great advantages in the production of material goods. As those other countries rebuilt after the war or industrialized for the first time, the US lost its advantage in material production, but gained advantage in finance, for it has one of the most advanced banking systems in the world and still generally an economic powerhouse. The world market system became less profitable for US-centered capital working under the free worldism system of accumulation. But, by utilizing new technological increases and organizational abilities that allowed for cheaper transportation of commodities and information, US capitalists satiated their need for more mobile capital by instigating a shift toward globalizing and financializing the general accumulation process itself. Newly globalized production processes, facilitated by finance, allowed US capital to liquefy in search of greater profit from abroad. The integration of many more actors into finance also increased profits, at least for a time.

Globalization

To begin elaborating the newest epoch of capitalism it will be beneficial to give Arrighi's nation-state/world hegemon centric view on large-scale transformations of capitalism a slightly different turn by pushing the nation-state as fundamental unit of analysis into the background to momentarily focus on changes capitalist social relations in a more general sense. This turn will show that over the last few decades the US has financialized – as Arrighi's theory suggests – but also shows that in addition to domestic financialization, advanced economies throughout the world are currently financializing due to the globalization of accumulation processes.

Robinson (2004) posits four epochal shifts of capitalism¹⁰ that roughly follow Arrighi's long centuries, but with some differences salient for an analysis of a 21st century financial crisis. For Robinson, the first epoch of capitalism consisted of its evolution out of

¹⁰ These epochal changes are not completely distinct and are processual occurrences in which both epochs can co-occur. In other words, there are not necessarily immediate, drastic shifts. Instead such shifts occur unevenly throughout time and space and are ongoing, overlapping processes.

feudalism toward mercantilism and primitive accumulation¹¹ and lasted roughly from the 15th to the end of the 18th century. It covers the long centuries of the Genoese and Dutch systemic cycles of accumulation. The second epoch is the age of competitive capitalism, and includes the industrial revolution and colonialism. This epoch lasted until the end of the 19th century and parallels the British long century and free trade imperialism.

The third epoch coincides with the US's initial cycle of accumulation that we have so far referred to as free worldism. It is characterized by US post-World War II hegemony, Keynesian economic theories based on the nation-state as a fundamental actor in the economy, and Baran and Sweezy's (1968) delineation of monopoly capitalism in which national firms vertically integrate, become larger, and compete in an oligopolistic manner. Following Robinson (2004), the third epoch also includes the formation of a singular, all-encompassing world market. In other words it includes the extension of capitalist markets across almost the entire world. We will return to many of these points and elaborate them more fully later. First, a brief description of the fourth epoch of capitalism is necessary.

The fourth epoch is, according to Robinson, globalization. It is characterized in great part by changes in the role of the nation-state, the shift from a world market to a global market, changes in the organizational form of corporations toward transnationality, and the globalization of the production process itself. In addition to the idea of globalization, this epoch includes the financialization of the global economy, for finance acts as a facilitator for the globalization process (Callinicos 2010). It also includes neoliberalism, which provides the ideological legitimacy for practical changes to the economy. Thus, the fourth epoch will be called *neoliberal globalization and financialization*, for each of these processes make up fundamental pieces of the newest epoch of capitalist social relations.

Each strand will now be separated analytically to delineate the fourth epoch. We will first illuminate the globalization strand, then move into financialization and how it facilitates globalization, and finally into neoliberalism as the ideological backing for those transformations of the economic system.

¹¹ I prefer Harvey's term *accumulation by dispossession* to that of primitive accumulation, for primitive accumulation insinuates that this epoch ended at some point. Accumulation by dispossession, on the other hand, goes on throughout time and is a relatively transhistorical term. See Harvey 2000; 2006; 2007b; [1982] 2007c; 2009 for further discussions of accumulation by dispossession.

Globalization is, according to Robinson, an “*essentially contested concept*” (2004:1, emphasis in original). The term globalization has been a buzzword in the social sciences for at least the last two decades and many debates about the nature of globalization have permeated the discourse since. Some argue that globalization is a benign and natural occurrence bringing the world together under the rationalization of the market process. Others argue that globalization is not necessarily a new phenomenon, but is instead only a furthering of previous capitalist tendencies brought to a slightly higher pitch. One position that crosses all definitions states that globalization refers to the increasing interconnections across the entire world, brought about by technological advancement in transportation and information technologies.

However, globalization should be characterized in a broadly Marxian sense, in that it refers to a change in *social relations* encompassing both the economic and political realms. Globalization is not a politically neutral occurrence, for it naturalizes commodified social relations, making them seem normal and objective. Put differently, globalization as it plays out in history is a definitively *capitalist* phenomenon, not a natural one.¹²

Furthermore, as Colás states, “capitalist globalization cannot be understood without reference to its ‘spatial fixes’ (see Harvey 2000); that is, the various sites of regulation, control and surveillance – from factory walls to border crossings – which, with the legitimation of the state, sustain the reproduction of the capitalist market” (2005:74). One of the foremost spatial fixes of globalization is the US acting as world hegemon and exporting neoliberal values of marketization and low barriers to trade. Thus, globalization affects not only the economy or market, but political actors as well, including most specifically the nation-state.

A pressing issue in debates about globalization concerns the role and power of nation-states versus the role and power of transnational capital. By moving past this dualistic thought process, we can see that these debates can be moved to a different and more fruitful plane.

¹² We could create a theoretical world in which globalization defined as the spread of technology or increasing interconnectedness is not necessarily capitalist in nature. However, in history this is certainly not the case.

The global/nation-state dualism is similar to the state/market dualism and both contribute to a form of social analysis that reifies these different but mutually contingent spheres subsequently leading to differentiated logics for global relations or international relations and state logics or market logics respectively (Robinson 2004). Following Robinson (2004), I conceptualize capitalism and the state/market through Marxian terms, which state that the two are internally related to each other, not externally related as a Weberian perspective might posit. What this means for the analysis is that, under globalization, state and market actors become more deeply intertwined than before while at the same time, the role of the state in the global economy changes. State power, especially in the US case, is increasingly exercised by capitalists and/or capitalist interests (Domhoff [1967] 2009; Liptak 2010; Mills [1956] 2000; Robinson 2004).

The Weberian view on the state/market dichotomy leads to differentiated logics for each, for through this perspective the state and the market are externally related and act upon each other rather than between and through one another in a dialectical relationship. This dichotomy plays itself out in the globalization debates through analyses stating that globalization entails an increase in the power of the economic logic over the logic of the state with the result that state power wanes relatively. Furthermore, “economic globalization is increasingly recognized, but is analyzed as if it were independent of the institutions that structure these social relations, in particular, states and the nation-state...” thus, “at the economic level the global logic of a world economy prevails, whereas at the level of the political a state-centered logic of the world system prevails” (Robinson 2004:95).

Dualistic thought assumes that there are two distinct and totally separate or externally related ways to view things. Dualistic thought makes either/or statements rather than getting at the true complexity of the subject by using both/and statements. Neither of the aforementioned approaches is completely right or wrong, but both tend along a spectrum based on the level and focus of analysis. Anti-dualistic thinking moves such debates to a new plane by transcending simplistic views and setting those views up in relation to each other. By moving past these dualistic formulations, we can better see how the state and market reinforce each other to spread capitalist social relations through the

world. Additionally, by applying anti-dualist thought to debates about nation-state power versus transnational capitalist power, these debates become futile – or better yet – more productive (Robinson 2004). If we can move past the global/nation-state dualism to a less dualistic and more fruitful conceptualization, the process and effects of globalization gain more clarity.

The nation-state system as set out by the Westphalian Treaty of 1648 set the stage for capitalism over the last few centuries. This system has not completely disappeared and neither has the nation-state nor its formidable power. But, the international nation-state system in which nations are the absolute foremost containers of power is in the process of changing, at least to a great enough degree that theoretical analysis must grapple with such changes. The *international* system, especially regarding finance, is turning into a *supranational* system (Bryan and Rafferty 2006) and other actors such as transnational corporations, transnational capitalists, and supranational institutions like the IMF, World Bank, G-8 and others have moved to the fore as fundamental actors and power-holders within the world-system. This has transformed not only the variables within the equation, but the relationships between the variables themselves. There has not been a complete rupture with the Westphalian international system – nation-states are still some of the foremost actors in numerous arenas of power, particularly in exercising military power and creating laws that organize capitalist markets. History though, is a process and more than enough qualitative change has occurred to require analytical shifts for theorizing the new century and the new epoch of globalization.

The hegemonic nation-state instigates and facilitates changes in worldwide capitalist social relations, but by pushing the nation-state as a fundamental unit into the background, we see that the overarching logic of competition itself leads to systemic changes that transcend nation-states. In other words, it is not only the world hegemon that transforms capitalism; the logics of capitalism itself lead to worldwide changes in accumulation processes. These changes are initially instigated by the world hegemonic state, for part of the reason for a state's world hegemony comes from its place on the forefront of new accumulation processes. Free worldism was the accumulation strategy for the US in the post-World War II era under its reign as full world hegemon and the US pushed markets

outward because it had advantages in them at that time. After signal crises in its hegemony, the US shifted toward financialization as an accumulation strategy for sustaining high profits in the face of its waning advantage in the materially productive sector and, taken along with the globalization of accumulation processes, this domestically oriented logic affected changes in the more general processes of accumulation for other actors in the world system, pushing them to globalize and financialize to keep up their rates of profit. The US's initial strategy of pushing capitalist markets outward geographically is an example of the extensive growth of capitalism. As that process neared its limits and stagnation set in, the unending search for profit pushed an intensive growth of capitalist social relations through the globalization and financialization of accumulation processes.

The extensive growth of capitalism is different from its intensive growth (Robinson 2004). Extensive growth refers to the widening berth of capitalism or the subsumption of more and more places under capitalist social relations. This is a geographical form of growth. In contrast, intensive growth refers to the deepening of capitalist social relations in already capitalist markets, or, more and more kinds of social relations being put under the auspices of capitalist relations. For example, the extension of capitalism to formerly non-capitalist nations like Russia, Latin America, China, and elsewhere constitutes an extensive growth of capitalism. From an international or world-systems level of analysis, with nation-states as the main units of analysis, capitalist social relations grow extensively as those nations, through institutional and juridical changes, subsume their societies under market relations. In Polanyi's ([1944] 2001) terms, these nation-states *embed* their societies in the world market.

The intensive growth of capitalism refers to the deepening commodification of human activity within an already capitalist place. As Robinson (2004) puts it, "... human activities that previously were outside the logic of capitalist production are brought into this logic" (p. 6). Intensive growth of capitalism in already relatively capitalist nations like the US refers to things like the subsumption of art or healthcare under market relations. For example, selling art on the market for profit when it formerly was given or traded is an example of the intensive growth of capitalism. To clarify, from an international perspective set above nation-states, the extensive growth of capitalism includes the spread of capitalist

markets to more and more nations – these nations begin to utilize capitalist markets for the first time. From a domestic-level perspective, the intensive growth of capitalism refers to already capitalist places putting more social relations under capitalist markets, or embedding more areas in market relations.

With those definitions clarified we can now reinterpret the epochs of capitalism in terms of extensive and intensive growth. The primitive accumulation epoch began the process of capitalism as a whole. It started with the shift toward a focus on the capitalist logic of power, which made the accumulation of profit a fundamental goal for the attainment of power and was thus both an intensive and extensive growth of capitalism in medieval, feudal Europe, for it put new places and new social relations under the logic of the market. In the second epoch, that of competitive capitalism, capitalist social relations spread extensively over much more of the world through colonialism and increased competition between fundamentally nationally based economies. Capitalist relations also grew intensively, especially in Britain, through changes to production processes such as the industrial revolution. The monopoly capitalist epoch spread capitalist social relations extensively throughout almost the entire world by integrating more and more nations under capitalist markets and logics. Over the 20th century the extensive growth of capitalism was mostly completed, though some nations held to different social relations for a time, even if only discursively. The organization of capitalist relations changed intensively in the US (and elsewhere) with the rise of the modern corporation and the promotion of a consumer society (Foster and Magdoff 2009).

During the third epoch of capitalism, the monopoly/corporate capitalism phase, world markets were extended geographically throughout the earth. Almost no country has gone untouched by capitalism and virtually all nations participate in capitalist markets in some form or another (Robinson 2004). This process continues to seep into whatever cracks may be left. Regarding globalization, the expansion or extension of the world market has reached its limits and intensive growth is all that is left. There are almost no other nations for capitalist social relations to spread to. Capitalism has instead begun to grow more intensively by transforming previous social relations into marketized relations oriented toward the pursuit of profit within already capitalist countries. Note that capitalist

social relations must continually grow due to competition and the tendency toward stagnation, a point that will be elaborated soon.

The US's cycle of accumulation as a whole has a specific tendency toward globalization. Through its integration of transaction costs and the extension of markets, the US pushed a competitive market onto the world. The US's shift away from the British style of overt imperialism led to a more economically oriented form of imperialism: imperialism through the spread of markets and competition. It was a qualitative change, but not the only qualitative change that the US century would bring.

The US's economic imperialism began as the creation of a world market based on competition between nation-states and nationally based small firms (a qualitative change from Britain's colonialist style that then moved into a quantitative, territorial spread of the world market). The logic of accumulation then fostered and partially moved through the epoch of monopoly/corporate capitalism (an epoch which saw a change in the form of domestically internal production through the rise of the large corporation acting as an oligopoly with a managerial class in a single nation-state – a qualitative, then quantitatively expanding change) toward what has now become a globalized market (another qualitative transformation of the capitalist system, yet again moving the predominant forms of accumulation into arenas that are more flexible and more competitive).

Under the Fordist style of business that was predominant in the third epoch, production and firms were mostly based in a singular country, while goods were increasingly sold abroad. This distribution of goods is what Robinson calls a world market and conforms to the epoch of monopoly capitalism, as well as the previous epochs. There has been a world market for centuries and over those centuries there has been a quantitative rise in trade, but relatively slow qualitative change in the way trade was done, aside from through technological increases in transportation and changes to production such as the industrial revolution or the Fordist mode of production.

In the initial phase of its hegemony, the US utilized the free worldism strategy of accumulation to spread capitalist markets as far as possible, generating profit through competition under terms of US advantage in the production of material commodities. This was a very world-market oriented strategy of accumulation and focused on the extension

of capitalist social relations, for the extension of capitalist markets is necessary to combat the stagnation tendency. Then, as the extensive growth of capitalist markets reached its limits, intensive growth became the engine for combating the stagnation tendency (Robinson 2004).

Though it seems we have strayed far from the financial crisis, the intensive growth of capitalist social relations in specific arenas over the last few decades are the long-term causes of the financial crisis. These arenas include: (1) the globalization and financialization of production processes and (2) the financialization of distribution processes.

The globalization transition is not a total rupture with such a world market, but is instead a transformation of the mode of production into a more horizontally integrated system, what Robinson calls a global market. Though they tend to be treated as such, firms are no longer necessarily citizens of a single country, making their goods within the country and selling them to the entire world; they are instead global actors that still care not who they sell their products to, but more saliently, spread their entire mode of production through the world in such a way that their goods can hardly be seen as national goods.

Globalization has shifted the earth from a world market to a global market. For example, there is a great difference between a car that is assembled at a Nissan plant in Tennessee, engineered in Japan by a company owned by investors all over the world, and managed from both Japan and the US – and a car that was made in Detroit by workers in the 1950s, under US management, with US steel, and US designs, to be sold mostly to the US consumer.

We can add more concepts to further flesh out this qualitative change. In the middle of the 20th century, the Fordist model of firm production and the nation-state oriented political economic theory of Keynesianism were dominant. From the 1970s on, the vertically oriented Fordist model of production transformed into a horizontal, globalized mode. Keynesianism was overtaken by neoliberalism. Keynesian economic theory and policy practice were abandoned for neoliberal theories and policy practices that coincided more with the needs of US capital. The US, losing its comparative advantage in the

production of non-financial goods to both recently industrializing countries and countries whose economies had recovered from the war, searched for liquidity through a move toward finance and the movement of productive material capital across the globe through the newly globalized production process. Furthermore, the globalized production process required the participation of many more economic actors in the financial sector, since inputs all along the commodity chain were traded on the global markets in addition to the usual trade of finished products.

This difference in the form of production is a qualitative change from mid-20th century capitalism to the capitalism of the late 20th and early 21st century, and thus requires the analytical distinction of a new epoch. The globalization of the production process is an intensive growth of capitalist social relations, for it makes every step on the commodity chain, each step being spatially fixed in a certain nation, a part of the larger process of production as a whole and puts each participant in these steps in competition with others across the whole globe (Robinson 2004). This globalized market is particularly suited for transnational investment and its workings increase competition between companies and between labor because each input on the commodity chain must compete with others all across the world. The globalization of production also increases capital's need for international finance, for commodity chains become transnational and require different forms of money at each link of the chain (Callinicos 2010). These increases in competition lead to significant changes in the capital-labor relation and forms of ownership of capital. We will soon see that new financial instruments come to play a much larger role in international finance due to the need to equate many forms of transnational capital under a system that utilizes only national money.

Financialization

As Callinicos (2010) states, the most recent financial crisis “is an economic crisis that exposes the depths of the contradictions that have been at work in the entire process of capital accumulation and not merely, as Keynes and Minsky would contend, the dysfunctions of the financial markets” (p. 50). Following Callinicos, “A comprehensive analysis of the present crisis requires us to distinguish the following dimensions: (i) a long-

term crisis of overaccumulation and profitability; (ii) a global financial system that is both chronically unstable and structurally unbalanced; and (iii) a growing reliance on credit bubbles to sustain economic expansion” (2010:50). Establishing the first two dimensions requires showing that advanced capitalist economies are stagnating at the same time that developing economies are attempting to unload their surplus through the expansion of their markets. Since capitalist markets already cover almost the entire earth, developing industrial nations look to advanced capitalist nations for absorption. In this precarious situation the US has used its role as hegemon to absorb global surplus through debt that is financed by recently industrialized countries (Davies 2010). In effect, the US borrows money from surplus countries to pay it back to them in return for their overaccumulated commodities. After linking worldwide stagnation and global imbalances to finance, we will see that further recourse has been taken in the US to counter stagnation by integrating more actors into the financial sector.

Under capitalist logics of accumulation – barring specific countering historical factors – economies tend toward stagnation (Arrighi 2010; Callinicos 2010; Foster and Magdoff 2009; Harvey 2007; Marx 1978). But it is not only the US economy that is stagnating; many nations in the world system are having difficulty finding avenues for the spread of their markets to absorb surplus (Davies 2010). To deal with this issue, it will be useful to note a theory that deals specifically with finance and the tendency toward stagnation in the modern age: the monopoly finance capital thesis.

It is worth quoting Foster and Magdoff (2009) at some length, for they summarize the monopoly capital thesis put forth by Baran and Sweezy (1968) that holds within it a formidable transformation of capitalism over the twentieth century that is very germane for the study. In essence, this theory links the proclivity for corporate enlargement to financialization and the stagnation of economies. According to Foster and Magdoff (2009):

In bare outline the argument of *Monopoly Capital* can be summarized as follows. At the brink of the twentieth century, capitalism underwent a major transformation, marked by the rise of the giant corporation. The early decades that followed were dominated by world wars and a depression associated with this great transformation. Following the Second World War the new stage of capitalism was fully consolidated, particularly within the United States, the most advanced capitalist economy. The result was a

situation in which a handful of giant corporations controlled most industries. This constituted an enormous departure from the freely competitive system of the nineteenth century, in which the economy had been mostly made up of small, family-based firms that had little control over price, output, and investment levels – all of which were determined by larger market forces.

In the new monopoly capitalist order firms behaved not as the freely competitive enterprises of textbook economics but as what Joseph Schumpeter in *Capitalism, Socialism and Democracy* called “corespective” firms, or rational, profit-maximizing oligopolies, each of which took their main rivals into consideration in their pricing decisions and in their attempts to increase their profit margins and market shares.... The result was what Baran and Sweezy called a “tendency of the surplus to rise” in the economy as a whole, and particularly in that part represented by the large corporations.

This meant that the main problem of the economy was to find ways to absorb the enormous actual and potential economic surplus.... Baran and Sweezy argued that the monopoly capitalist economy was characterized by a tendency to stagnation as profitable investment outlets for the surplus were found lacking and as other ways of absorbing surplus... were unable to pick up the slack. The resulting chronic overcapacity in production kept capital accumulation on a short leash by reducing expected profits on new investments and hence the willingness to invest.

The pivotal issue for monopoly capital was to find additional outlets for surplus, beyond capitalist consumption and investment, that would serve to keep the system from sinking into an economic malaise. (Pp. 64-5)

In addition to the monopoly capital thesis, which is concurrent with the monopoly phase of capitalism, Sweezy later noted a great limitation to his and Baran’s argument: they did not foresee the growing financialization of the economy (Foster and Magdoff 2009). Foster and Magdoff, in their book *The Great Financial Crisis: Causes and Consequences* (2009) argue that “although the system has changed as a result of financialization, this falls short of a whole new stage of capitalism, since the basic problem of accumulation is the same. Instead financialization has resulted in a new hybrid phase of the monopoly stage of capitalism that might be termed ‘monopoly finance capital’” (p. 77). This hybrid phase is further reinforced by the general stagnation of advanced capitalist economies like the US and the overaccumulation problems of recently industrialized economies such as China (Callinicos 2010). As stated earlier, this phase is also thoroughly characterized by the

globalization of accumulation processes that require finance to “grease their wheels,” so to speak.

Capitalists tend to expand markets for their commodities to keep up their rates of profit in the face of stagnation. Now that almost the entire world has become part of capitalist markets, there are few if any places to extend those markets further. Accordingly, capital has found another way to grow: capitalist social relations grow more intensively in already capitalist nations. Under the new epoch of neoliberal globalization and financialization a main tactic for this intensive growth is the integration of more actors into finance, for finance can raise the rate of profit through interest rates as well as facilitate the sale of commodities and capital to actors who may not have been able to afford it to start. The integration of more actors into finance increases overall debt for nations, for consumers, and for corporations that normally function only in the materially productive sector (Callinicos 2010). Increases in debt keep the rate of profit up for a while, but when it comes time for bills to be paid many problems arise.

As capitalist markets approach their extensive limits many recently industrialized nations search in vain for new markets for their surplus goods. Then, they look to advanced capitalist countries to absorb that surplus (Davies 2010), but those countries’ economies have become relatively stagnant due to the tendency of the rate of profit to fall. This global stagnation leads to an overall savings glut or an overaccumulation crisis in need of remedy. That remedy has recently been found in the creation of US debt. The US government, through debt-financed consumption, receives loans from developing countries and then uses those loans to purchase goods from those countries and pay for war (Davies 2010; Callinicos 2010). This process brings nation-states themselves in as financial actors and financializes the global commodity *distribution* process.

Global account imbalances have been building for years due to lacking avenues for the sale of commodities. Aggregate global demand is not high enough to consume all of the products coming from newly industrialized countries like China without the use of credit and debt. The US has acted as a sink for the global savings glut by increasing “its debt dramatically without suffering the inability to finance it” (Davies 2010:18). The recent

downgrade of US debt foreshadows the US's faltering ability to continue this process indefinitely.

Regardless, the role of the dollar as the main global trading currency means that US treasury bonds continue to be one of the safest places to hold value; surplus countries and businesses continue to purchase US government securities. Such massive purchases (China holds around \$2.5 trillion in US securities) have kept interest rates low, leading to an environment where numerous US investors are searching for high returns in other kinds of assets (Davies 2010). These higher returns are found in new financial instruments that purport to limit risk while keeping returns high, even in cases like the subprime mortgage market, a point that will be elaborated in the next chapter.

Additionally, other players are brought in to the financial sector as actors increasing financialization in general. Corporations that normally work only in the materially productive sector such as auto manufacturers expand their operations to include the financing of consumer debt, integrating consumers into the financial sector through the creation of debt and edging banks out of that arena (Callinicos 2010). This puts more of a squeeze on bank profits and pushes them toward more risky investments. For example, over the last few years car manufacturers have begun offering their own system of loans to consumers, allowing buyers to finance their purchases through the car company itself. These corporations integrate finance directly into their accumulation strategies, bypassing the banks, and making themselves part of both the financial and materially productive sectors of the economy.

Some might blame US consumers for using credit to keep up the "high-end" lifestyles they have become accustomed to. But, rather than treating growing debt only as a US phenomenon based on high consumption levels in times of stagnant real wages, the growth of overall debt should instead be seen as the result of a systemic capitalist logic that integrates more and more actors into the general financial system. As consumers face stagnating wages and increased offerings of credit, they are integrated into the financial sector as actors by taking on more debt, whether through mortgages, refinancing, auto loans, credit cards, or other debt avenues – amounting to the financialization of the consumption process.

Rather than consumers using money already earned to make purchases to increase general demand, this demand is created through debt itself, further integrating labor into the financial sector. This is a very interesting tactic because it includes two countertendencies to the falling rate of profit. First, the wages of laborers are “squeezed” to raise the profit rate, a common happening. Secondly, as prices of commodities rise with inflation workers are less and less able to purchase them and they are pushed to utilize credit and take on debt. Debt is, of course, not free and workers must not only pay the asking price for commodities, but must also pay interest on top of the normal price. Bryan, Martin, and Rafferty (2009) elaborate this nefarious process in Marxian terms:

Surplus value continues to be produced and appropriated in the conventional way, but financialization changes our understanding of labor as both variable capital and commodity capital.... Economically, the household not only consumes commodities and reproduces labor power, it also engages finance, particularly through its exposure to credit, the demands of financial calculation, and requirements of self-funding non-wage work in old age.... With financialization, the reproduction of labor power starts not with commodities, as conventionally posed, but with credit. Credit is used to buy commodity inputs for the household (M-C at the “beginning” of the circuit). Then, leaving aside the issue of how we conceive of production within the household, somewhere before the circuit begins again, some part of the wages paid to labor power (C-M at the “end” of the circuit) must accrue as interest payments on money capital advanced to households. (Pp. 461-3)

Both industrial corporations and laborers, who normally function in the materially productive sector, become a part of the financial sector. Thus, they feed more directly into the financialization of the accumulation process and financialized social relations grow intensively to include not only the way commodities are produced, but the ways they are distributed and purchased.

In summation, the aforementioned global savings glut and its absorption by debt-financing from the US means that governments themselves have become more integrated actors in the global financial sector, contributing to the financialization of the distribution process. Corporations that usually act in the material-productive sector begin acting in the financial sector and put more pressure on banks. Consumers are added to the financial sector because they can no longer afford to purchase all that they need with their profit-

squeezed wages and the reproduction of labor is financialized. The stagnation of the productive sectors of advanced capitalist economies and the extension of capitalist social relations all over the world leave no room for the geographical spread of markets in search of further investment opportunities. To find more arenas for investment, capital began a more intensive form of growth: the financialization of the US and global economies.

The globalization and financialization of accumulation leads to another change in the capitalist world system: derivatives have risen in prominence due to low interest rates and squeezes on bank profits. But, as will be shown later, derivatives have risen in prominence due not only to increases in financialization and speculation, but also because of the lacking ability of national money to anchor the global financial system in the absence of a Bretton Woods or gold standard system (Bryan and Rafferty 2006) and the presence of transnational links on singular commodity chains.

While these transformations may have generated profits for US capitalists, the US people in general were not so lucky. Wages for US workers stagnated through increased global competition in labor markets and a breakdown of the Keynesian labor accord (Harvey 2005). In the wake of the oil-shocks and the demise of the Bretton Woods systems in the 1970s, exchange rates became more volatile and the policy trilemma moved to a new stage.

The macroeconomic policy trilemma in international finance declares that a nation-state can provide two, but not three, of the following, as laid out by Bryan and Rafferty (2006:107):

- National policies to support labor's living standards
- Large scale capital flows, and
- Stable exchange rates

With the dual perceived need to keep up large scale capital flows while stabilizing exchange rates, the third leg of the trilemma stool was broken. Capitalist elites in the US shifted emphasis away from domestic profit-making toward privatized profit-making for a transnational capitalist class, all with the help of the neoliberal ideology. But how were these changes – changes that negatively affect an immense proportion of the population – thrust upon a purportedly democratic public?

To justify these arguably detrimental changes to the majority of US people required a strong and comprehensive form of ideological legitimization. That legitimization was created by reinterpreting and recombining numerous lines of thought in the US, including a radical reinterpretation of classical liberal values that the US was founded on and a very thorough and far-reaching change to the Keynesian economic theories that dominated the post-Great Depression and post-World War US landscape. This legitimization process is the subject of the next section.

Neoliberalism

Neoliberalism is arguably the overarching and hegemonic ideology of both US and global capitalism today. Neoliberal policies have been implemented throughout the world since at least the late 1970s and these ideas continue to hold sway over the US, as well as many other countries and their governing systems. Latin American countries have faced the imposition of neoliberal policies (Rowland 2008). Even currently and formerly “communist” nations like China and Russia have taken on neoliberal characteristics (Harvey 2007a; Lapavistas 2005; Palley 2005).

We saw from the previous chapter that capitalism in the world-system roughly follows systemic cycles of accumulation over the long run and that in the twentieth century the US rose to world hegemony, though its power is now in decline. Much like the world hegemons before it, the US has seen a decline in its comparative advantage in the production of material commodities, a decline in the profit rate within that sector, and, concordantly, a domestic shift toward the financialization of accumulation. Though these systemic cycles have similarities, there are also many qualitative changes that occur throughout the cycles that are historically specific. For example, the previous section shows that when globalization occurs alongside US world hegemony there is a tendency toward global, rather than only a national financialization of accumulation and distribution. In addition to these changes, neoliberalism became a specific configuration of the political-economic system of the US in the latter half of the twentieth century, especially since the late 1970s, and, when taken along with globalization, financialization, and US world hegemony, neoliberalism legitimated and pushed forth a qualitative shift in the capitalist

system as a whole, a shift that led to the financial crisis. This shift came about due to contradictions inherent in the capitalist system, contradictions specific to the US free worldism form of accumulation, and the attempts of US and global capital to maintain rates of profit in the face of such problems *even at the expense of the US people*.

After the move toward Keynesianism in the first half of the twentieth century and the so-called “golden age of capitalism” in the 50s and 60s, we see a shift in American political-economic ideology and policy toward deregulation of the market and the extension of the market mentality to all arenas of life in the US – essentially an intensive growth of capitalist social relations. Furthermore, we see a move toward more liquid assets within a globalizing world and a concurrent move to globalized forms of production.

Such an immense shift required thorough legitimation and the creation of consent within the American public, for these changes are arguably quite detrimental to US people and to others throughout the world. Although from the perspective of US capital, they were necessary to increase their rates of profit under waning US advantages. Neoliberalism provided the ideological legitimation necessary for capital to make such changes to the US economy and is thus a substantial medium term cause of the financial crisis.

To discursively remove the state from the economy, and therefore free capital to be mobilized in more profitable areas outside the US, people in power such as politicians and academics utilized a radical reimagining of the classical liberal ideology and core US values of individual rights and freedoms to create a hybrid political-economic ideology buttressed by new orthodox economic theory and a bastardization of core US political values. The word discursive is key here, for the practices under this ideology do not necessarily coincide with the theoretical or ideological legitimations espoused by proponents; in fact, in many instances these ideas cannot objectively be put into practice. Put simply, the state cannot be removed from the economy, for in great part, the state creates the laws and institutions that make up the structure of the domestic economy. We must therefore interrogate the ideological backing that was necessary to institute such changes, for the dialectic of discursive ideology and actual practice make up two fundamental lines in the overall restructuring of the US economy over past decades, a global and domestic restructuring that set the stage for the financial crisis.

The discourses and practices under neoliberal globalization are consistently contradictory, but are at the same time deeply interrelated. One cannot be rigorously understood without the other. To understand the financial crisis through a thoroughly historical lens it is first necessary to understand the ideological component that allowed a shift away from domestic production and the so-called capital-labor accord toward an economy based in financial profit-making through globalized neoliberalism. Ideological backing for this shift was absolutely necessary, for the results for the vast majority of Americans were very arguably negative.

Altogether this chapter and the next function to fill out the lower levels of Braudel's tiers that were left open by Arrighi's analysis. The two chapters elaborate the recent complex interactions between state and market forces, showing how cultural, political and economic ideologies have come together to buttress the practiced transformations of capitalism over the last few decades, all of which lead directly into the creation of the most far-reaching global financial crisis since the Great Depression.

Neoliberal Ideology vs. Neoliberal Practice

Neoliberalism as a holistic matrix includes the radical reimagining of classical liberal values that the US was founded upon and the integration of that ideology with the new orthodoxy of economic theory as well as the subsequent use of that theory in political practice. However, to better understand the complex entity that is neoliberalism, some analytical distinctions are necessary. First, there are two main threads moving simultaneously within the concept of neoliberalism that we will focus on.¹³ One line is made up of the economic and political ideological discourses used to justify structural changes to the state and economy, which is the subject of this chapter. The second line is made up of those actual juridical and organizational changes and includes the changing

¹³ Neoliberalism is both a *political* and an *economic* ideology. This ideology is based in a complex historical matrix of economic, philosophical, political, and social theories whose lineage dates back at least to the seventeenth century. Due to the variant nature of neoliberalism it can be further broken down into separate but not wholly distinct aspects: neoliberalism as a political-philosophical ideology based on liberalism, neoliberalism as a reaction to failures and contradictions in Keynesianism, and neoliberalism as it has been practiced since the late 1970s in the US. Since these aspects are intimately intertwined with one another, full separation is quite impossible. For the sake of further understanding though, we will simply focus our lens on the different aspects, letting the other categories fall back into the periphery to be brought back in later.

government policies, institutional, and business practices in the US economy since the Great Depression, all of which will be elucidated in the next chapter. Thus, this chapter is a brief history of some of the *ideas* that led up to the financial crisis and the next chapter further elaborates the *practices* that led to the financial crisis.

On the whole, an elaboration of the neoliberal ideology will lead us to a better understanding of the relation between liberalism and neoliberalism, the role of Keynesianism in the rise of neoliberalism, and how neoliberalism has worked “on the ground” through institutional policy, political-economic ideology, and concrete historical factors to create the financial crisis.

Though neoliberalism is an arguably hegemonic ideology that has permeated the political-economic landscape for many years, “... defining neoliberalism is no straightforward task... because the term ‘neoliberalism’ stands for a complex assemblage of ideological commitments, discursive representations, and institutional practices, all propagated by highly specific class alliances and organized at multiple geographic scales” (McCarthy and Prudham 2004). Furthermore, neoliberalism is deeply intertwined with globalization and, much like globalization, is an “essentially contested concept” within the social sciences.

At its base, neoliberalism is defined by the idea that the market mechanism, rather than the state or society, holds primacy in the economy (Harvey 2007a; 2007b; Polanyi 2001). Polanyi, in his seminal work *The Great Transformation* ([1944] 2001), theorizes the shift from feudalist social relations to capitalist social relations in Britain in the 19th century. To use the terms previously described, neoliberalism is an intensive growth of such relations within the US, for it embeds more social arenas in the market logics of an already capitalist nation. Neoliberal ideology also holds that the role of the state in the economic sphere should be minimized as much as possible and should serve only to create conditions necessary for the market economy to flourish (Harvey 2007a). This idea holds within it numerous contradictions, including the fact that the state must play a constant and active role in creating the conditions for a “free” market economy, such as upholding private property rights and promoting market-oriented legal frameworks. The state plays an especially important role in the time of crises as well by upholding the monetary system

in the face of dire circumstances. We will see later that this role for the state will cost US taxpayers a great deal over many generations.

One significant piece of neoliberal ideology contends that the welfare state and Keynesian style economic intervention are taboo, because individual actors, acting in their own “rational” best interests, will lead to the most efficient allocation of resources (George 1999). We should note, however, that the ideological revolt against Keynesianism has not abolished it completely in practice – state manipulation of aggregate demand still happens in practice, though it is often either criticized or not addressed discursively at all. Recent US debates on Obama’s (perverted) Keynesian healthcare policy and the government’s weak Keynesian bailouts in the wake of the crisis are examples of the contentiousness surrounding weak 21st century Keynesian policies.

Harvey states many neoliberal propositions succinctly: “neoliberalism is a theory of political economic practices proposing that human well-being can best be advanced by the maximization of entrepreneurial freedoms within an institutional framework characterized by private property rights, individual liberty, unencumbered markets, and free trade” (2007a:22). Neoliberalism holds true to the US free worldism goal of extending capitalist social relations throughout the world, but also entails an intensive growth of such relations within the US political economy itself.

The neoliberal ideology was created from an economic theory “that proposes that human well-being can best be advanced by liberating individual entrepreneurial freedoms and skills within an institutional framework characterized by strong property rights, free markets, and free trade” (Harvey 2007a:2). Strong private property rights, little state intervention, and a myopic focus on individual responsibility are fundamental features of this ideology. According to neoliberal theory and its foundation on utilitarian economics, individuals acting in their own personal interest under markets that are not regulated by the state will bring the most well-being for the most people. By reifying the abstractions of economic disciplines and treating the market as a comprehensive natural reality, US political leaders and economists turned core American values on their head, proposing freedom through domination by politically, economically, and ideologically created markets. Social welfare was cut immensely, for under this framework, any state

intervention, even when directed toward human well-being, is against the general interest of the country (MacGregor 2005). Furthermore, social welfare entities creating a cushion for the American public, such as social security, were put under the rubric of the privatized “free” market under the auspices of the maximization of profits, relegating these safety nets to the grand casino of capitalism and increasing the intensive growth of such forms of social relations (see Soederberg 2010, Chapter 2).

To further flesh out the history and present use of neoliberalism, we must first gain a greater understanding of liberalism, a nominal source for the political legitimacy of neoliberalism. Then, neoliberalism will be framed historically as following the previously dominant orthodox economic theory in the US: Keynesianism. After that we will outline some further basic ideological and theoretical tenets of neoliberalism by looking briefly at some of its founders and main proponents such as Ludwig von Mises, Friedrich Hayek, and Milton Friedman. Throughout this discussion, neoliberalism will be framed in opposition to both Keynesian, and Polanyian theories of political-economic organization, for these were the theoretical movements that surrounded neoliberalism’s historical foundations (George 1999).

Political Ideology vs. Academic Ideology

Though its strength comes from the synthesis of legitimating ideologies, it is analytically helpful to break the ideological component of neoliberalism into two parts. The first arena is the political legitimization of neoliberalism and includes neoliberal’s recourse to core American values and the use of political rhetoric. The new orthodoxy of economic theory, which informs said political practice, is the second arena through which neoliberalism is legitimated and focuses on the shift from Keynesian economic theory to theories positing that state intervention in general is detrimental to the economy. These two arenas combine together and support each other to create a very strong discourse that legitimates the government’s movement away from focusing on national economy building and the welfare of US society toward an emphasis on creating a competitive atmosphere for transnational capital. Taking neoliberalism as a specifically political ideology, it is a radical

reinterpretation of the liberal values that the US was founded on, used as a means to create consent in the American public.

Neoliberalism is, as the name implies, an offshoot and reworking of classical liberalism. However, “neoliberalism could scarcely be understood as a as the recovery of a lost tradition of liberal, political thought. It should... instead be seen as an ideology different from, and often opposed to, what is more commonly described as ‘liberalism,’” for in a common understanding, liberalism refers to the general ideas of the promotion of democracy and freedom (Thorsen and Lie 2000:3). In short, a harkening back to the liberal answers to feudal society and the creation of liberal democracies, rather than furthering truly substantive democracy, has actually created a governing system that favors oligopolistic corporations and transnational capitalists, not US society.

Classical liberalism can be traced back to the writings and work of the seventeenth century philosopher and political economist John Locke, among others (Locke [1689]1993; [1690] 1979; 1997; Locke and Sigmund 2005). One of the most salient pieces of Locke’s philosophy is his view on the privatization of land, for on the surface it answers feudalism with the liberation of individuals and gives them the ability to exercise more dominion over their own lives. In contrast though, we see that these views on private property now allow for the monopolization of the ownership of the means of production and, when applied under this monopolization of capital ownership, actually lead to less substantive liberty for individuals. According to McCarthy and Prudhon, “For Locke, property relations over land, and specifically individual, private property rights guaranteed by the state, constituted the foundation of a just and efficient social order... that would replace authoritarian ecclesiastical and feudal regimes” (2004:277). These property relations, supported by the state apparatus, form a fundamental part of both classical liberalism and neoliberalism. Private property, which seems like a “common sense” idea today, has not been universally accepted throughout all time, and is therefore historically specific and not necessarily natural (Polanyi 2001).

The liberal ideas of private property actively put land under the rubric of the market, and through doing so, (re)created social and economic relations as market based relations.

McCarthy and Prudhon (2004) state Locke's views on nature and private property succinctly:

Locke provides crucial ideological and discursive foundations for liberal and modernist dispositions toward non-human nature by (i) conferring value on nature only through the application of human labor, and conversely, by denigrating "unimproved" nature as value-less; (ii) constructing a moral economy of liberal society based on exclusive control of land by those individuals who work it, including enlistment of the state to protect individual land rights; and then, (iii) arguing for the unlimited individual accumulation of land and property, including beyond that which individuals could work themselves. (P. 277)

Locke attempted to pull the people out from underneath the feudal system, but his ideas had glaring consequences for the structure of society, especially when reinterpreted and applied under the epochs of monopoly finance capitalism and neoliberal globalization. So, in opposition to most current orthodox political economic beliefs, rather than abolishing all classes for freedom and democracy, these Lockean ideas created a new class structure based on land ownership, setting up the "state as (the) servant of landed property owners" (McCarthy and Prudhon 2004:277). While capitalism may be an advance on feudalism, it is not necessarily the most beneficial set of social relations for the world.

Though the two are certainly intertwined, for our present purposes, it is best to make a distinction between liberalism in a political sense and economic liberalism, for liberalism in a general sense usually refers to a political ideology based on the ideas of freedom or liberty for the individual and a reliance on democratic institutions. In other words, liberalism in the general sense refers to the philosophical underpinnings of the modern state revolutions of France and the US in the late 18th century, *specifically in opposition to feudal social relations*. Neoliberalism has relied upon such revolutionary answers to feudalism as core values, but also reinterpreted and turned those answers against other forms of accumulation such as communism, socialism, and the welfare state. On the other hand, economic liberalism refers to "the belief that states ought to abstain from intervening in the economy, and instead leave as much as possible up to individuals participating in free and self-regulating markets" (Thorsen and Lie 2007:2). While the two are inextricably connected as shown in Locke's views above, it is helpful to understand neoliberalism in

practice as an outgrowth of the more economically oriented aspects of liberalism, though these practices are legitimated through reliance on core revolutionary American political values, making them quite strong in the collective political consciousness of the US.

Consent for neoliberal policy changes was also garnered through political rhetoric. Margaret Thatcher's dictum that "There Is No Alternative" (TINA) is a prime example. Freedom is an integral part of any democratic society, for the freedom to vote one's wishes without coercion is what makes up the basis of democracy. Appeals to freedom in the US have always run rampant, but under neoliberalism a certain form of freedom must be actualized: *individual* freedom. Under this kind of freedom, one's decision making and actions are considered to be completely distinct and cut off from others.¹⁴ On the surface this seems quite liberating, at least to a certain degree. Freedom of speech, freedom of expression, and freedom to move are all decent freedoms. However, this type of freedom also brings with it the freedom to fail, regardless of one's circumstances. It could also include the freedom to abuse the environment. Another kind of freedom could be possible: structural freedom. Structural freedoms would include the freedom to access housing, health care, unemployment insurance, and the freedom to retire at a certain age *regardless of status and power*. This collective freedom, though, is not the kind of freedom that American politicians are talking about. The individual freedom espoused by the neoliberal ideology is aimed directly at the state, and more specifically, at the Keynesian welfare state that had evolved in the US. When individual freedom is mixed with the economic ideologies of people like Hayek and Mises, we are led to believe that collective freedoms accorded by the state would lead to nothing but inefficiency in the economy and a worse world for all. The omnipresent Cold War ideology and the US's routing out of communism played a hefty role in the creation of the ideology of individual freedom. By cloaking their business interests in old American ideas, the capitalist class in America forged a new common sense based in a form of libertarianism. We can see from the Tea Party movement today that this "common sense" ideology is still quite strong in the American public.¹⁵

¹⁴ For examples of the ideology of individualism in the US, see Rand 1963; 1964; Rand et.al. 1986.

¹⁵ The works of Ayn Rand cited above are oft-cited texts in this movement.

The harkening back to liberal values that the US was founded upon and utilization of those values to promote further marketization of US society is a stark example of what Horkheimer and Adorno ([1947] 2007) refer to as the dialectic of enlightenment. In short, the dialectic of enlightenment refers to the mis- or over-application of enlightenment values to modern life. As Horkheimer and Adorno (2007) state, “Myth is already enlightenment and enlightenment reverts to mythology” (p. xviii). Neoliberalism and its discourses tend to apply concepts of market rationality and reactions to feudalism – ideas from the 17th and 18th century – to life in the late 20th and early 21st century. Thus, in the current age “enlightenment reverts to mythology;” it reverts to a mythology that reifies the market and ideas of freedom by positing a hyper-rationalized, outdated “commonsense” understanding of social life that serves to promote the interests of capital over people. One would have to be hard-pressed to find a better example of Horkheimer and Adorno’s dialectic of Enlightenment than neoliberals’ recourse to centuries-old revolutionary ideals.

To further show direct political attempts to create consent on a grand level, Harvey (2007a) quotes a confidential memo from Lewis Powell to the US Chamber of Commerce:

Powell... argued that criticism of and opposition to the US free enterprise system had gone too far and that “the time had come – indeed it is long overdue – for the wisdom, ingenuity and resources of American business to be marshaled against those who would destroy it.” Powell argued that individual action was insufficient. “Strength,” he wrote, “lies in organization, in careful long-range planning and implementation, in consistency of action over an indefinite period of years, in the scale of financing available only through joint effort, and in the political power available only through joint effort, and in the political power available only through united action and national organizations.” The National Chamber of Commerce, he argued, should lead an assault on the major institutions – universities, schools, the media, publishing, the courts – in order to change how individuals think “about the corporation, the law, culture, and the individual.” US businesses did not lack resources for such an effort, particularly when pooled.... The American Chamber of Commerce subsequently expanded its base from around 60,000 firms in 1972 to over a quarter of a million ten years later.... The Business Roundtable, an organization of CEOs “committed to the aggressive pursuit of political power for the corporation,” was founded in 1972 and thereafter became the centerpiece of collective pro-business action. The corporations involved accounted for “about one half of the GNP of the United States” during the 1970s, and they spent close to \$900,000,000 annually (a huge amount at that time) on political matters. (P. 43-44)

Some further cultural issues were also at play in the creation of consent for neoliberal policy. The power of unions and the comfort of the welfare state may have made labor in the US feel somewhat safe during the 1970s and contributed to a lacking perceived need for unions (Palley 2007). Moreover, liberal use of the Taft-Hartley act contributed to a fall in union power and the bargaining rights of employees (Crow and Albo 2005). The fostering of a consumer culture in the US also created the identity of individuals through style. In the context of falling wages this consumer culture was financed by debt.

So far, we have seen that neoliberalism is a hegemonic *political* ideology, especially within the US. To make this argument, we must recall Arrighi's distinction between hegemony and dominance: hegemony rests on consent, while dominance rests on coercion. It would be quite difficult to *coerce* US society to deal with the repercussions of neoliberal policy practices, for that would require a great amount of resources. Instead, the US capitalist class has pushed Americans to *consent* to such changes through a radical reinterpretation of core revolutionary American values, thus making neoliberalism a hegemonic ideology in the political realm (Harvey 2007a).

Neoliberal globalization is the new form of accumulation promoted under the aegis of waning US world hegemony. Under such waning hegemony, in order to keep up the rate of profit US capital requires recourse to higher liquidity, for more advantage in the production of material commodities is now found outside the US economy. To realize these profits requires a shift away from focusing on the US economy itself toward a focus on profit from investment elsewhere and the ensuing loss of jobs in the US. As such, US capital has relied heavily on legitimation of policies through the political ideology of neoliberalism.

The hegemony of neoliberalism as a political ideology creates general consent from the masses, but political consent is not the only strand of discourse that legitimates changes to the US social system. US capital has also relied upon ideological legitimation from the arena of more purely economic theory.¹⁶ A substantial reason for the strength of the neoliberal ideology in the US and abroad is its ability to use a mixture of both political and academic ideology to support its claims; this mixture creates a very strong discourse in which political ideology is justified by "science," as well as by political beliefs. Recourse to

¹⁶ For example, see Friedman 1993; [1962] 2002; 2008; Friedman and Schwartz 1971; Friedman and Schwartz 2008

positivist academic theory fuels globalization and financialization, which are beneficial to US capital, since economic theory is normally viewed as both natural and objective (Albritton 2007), allowing for its export to other countries and keeping US world hegemony “legitimate” even in its waning stages.

Accordingly, the next section deals with the shift from Keynesianism – an economic ideology rooted in modern liberal ideals that held great power over the US in the wake of the Great Depression and World War II – to neoliberalism as a decidedly economic theory based on reinterpretations of classical and neoclassical economics.

From Keynesianism to Neoliberalism

“There is a dramatic contrast between the last 20 years of the twentieth century and the previous decades since the Second World War,” according to Duménil and Lévy (2005:9). They are referring here to the shift from Keynesianism or embedded liberalism to the neoliberalism that has characterized US (and global) political economy since the late 1970s. Although the exact beginnings and transitions of dominant political-economic ideologies are difficult to pinpoint, research shows that the periods of 1945 to the late 70s and from the late 70s to the beginning of the 21st century are worthy delimiters for the temporal distinction between Keynesianism and neoliberalism (Palley 2005; Harvey 2007a; 2007b; Duménil and Lévy 2005). According to Palley, “For the 25 years after World War II (1945-1970), Keynesianism constituted the dominant paradigm for understanding the determination of economic activity” (2005:21).

To put Keynesianism in a nutshell, it is an economic paradigm stating that “the level of economic activity is governed by demand” and that “capitalist economies are subject to periodic weakness in the aggregate demand generation process, resulting in unemployment” (Palley 2005:21). Keynesianism came out of a structural crisis of capital accumulation: the Great Depression. Crises of that sort are periodic happenings in capitalism; the Great Depression is surprisingly similar to the financial crisis that now faces the world.

Though Keynesians are certainly still capitalist, they acknowledge and attempt to ameliorate some of the barbarities of capitalist accumulation.¹⁷ Keynesians tend to believe that the government can step in to use fiscal and monetary policy to reinvigorate the economy and lower the unemployment rate. Essentially, this means that in times of recession or depression, the government should spend money to create more jobs, much like during the New Deal era. Similar to monetarist arguments, Keynesians say that the government should also utilize federal banking policy to manipulate the money supply and lower interest rates, which creates more liquidity in the market (Palley 2005).

When states promoted their economies by readying for World War II they proved some of Keynes's ideas unequivocally, because "the Second World War rescued international capitalism from the Great Slump of the 1930s" and "restored production levels, employment, productivity, and profitability in the US, the heartland of the international capitalist economy" (Lapavitsas 2005:31). This restoration ushered in what is commonly called "the golden age of capitalism." Along with this great restoration came the US's shift toward Keynesian economics, since Keynesian ideas were given much credit for the increases in productive capacity. Furthermore, the capacity of wartime spending to pull the US out of the Great Depression gave credence to Keynes's ideas, as did the creation of a highly consumerist society and new forms of increased debt for individuals. Though things were far from perfect, many US workers in the 50s and 60s "could expect stable employment and rising real wages" (Lapavitsas 2005:31). This stability is commonly referred to as the "capital-labor accord."

Keynes shunned the economic orthodoxies of the past, including Adam Smith's classical economics and the neoclassical economics of Alfred Marshall. Specifically, Keynes attacked three main tenets of the economic orthodoxies of the time: Say's Law, The Quantity Theory of Money, and the anti-psychological rational choice theory of economic action (Lapavitsas 2005).

Say's Law states that supply and demand will reach equilibrium in the long run and thus, that long term capitalist crises will not exist. In the wake of the Great Depression this "law" had been proven empirically to be false. Contrasting the orthodoxy, "Keynes argued

¹⁷ For more on Keynes see Minsky [1975] 2008a; Keynes [1926] 2011a; [1936] 2011b.

that aggregate demand systematically falls short of aggregate supply” and that this “systemic deficiency of aggregate demand means that free markets fail to clear, thus producing mass unemployment” (Lapavitsas 2005:32). One can easily see the parallels between then and now.

The next rejection on Keynes’s agenda was the Quantity Theory of Money, which states that “the level of prices is ultimately determined by the quantity of money” (Lapavitsas 2005:32). Under this theory, inflation occurs through increases in the money supply. However from a Keynesian perspective, during times of recession capitalists may choose to hold on to money made from the sale of commodities rather than spending it on more commodities, for money is more liquid than commodities. This hoarding of money reduces aggregate demand in the economy and furthers stagnation due to lacking demand for more commodities and more workers. Although part of the argument in this chapter is that Keynesianism has been superseded by neoliberalism, we will see later that Keynesian-leaning policies are still occasionally implemented, but in bastardized ways that do little to create demand. For example, the government bailouts provided after the onset of the financial crisis were somewhat Keynesian in that their goal was to use public, government funds to alleviate rising unemployment and stem the liquidity crisis. However, the funds were distributed with no strings attached and, rather than benefitting people in general, they arguably benefitted only financial capitalists, and led to a public reaction against such government intervention, further reinforcing a more neoliberal economic agenda. This reinforcement is exemplified by the influx of tea party candidates into the government, the shift of many Republicans to the far right, and the recent inability of the US government to agree on raising the debt ceiling.

Finally, Keynes rejected the classical idea that economic actors always make purely rational choices. He posited that in economic action there are always choices being made with regard to future expectations; these expectations have a necessarily psychological component to them that may not be fully rational (Lapavitsas 2005). For example, in times of recession or crisis capitalists may hoard money due to their expectations, as opposed to following the rationality of economic theories by putting it back into the economy. In theory, putting that money back into the economy would raise aggregate demand and pull

the economy out of recession. Yet again, one can see these issues coming to the fore in the government bailouts given to banks and financial capitalists in the wake of the financial crisis: instead of using the bailout money to lend, many banks simply sat on their newfound reserves and the economy stagnated.

Keynes's assertion that aggregate demand may not equal aggregate supply accorded a course of action for the state: the government could legitimately intervene in the economy in times of recession or crisis, strengthening aggregate demand by "boost(ing) public expenditure, cut(ting) taxes, and lower(ing) government interest rates, with a view toward strengthening aggregate demand and lowering unemployment" (Lapavitsas 2005:32). Keynesian tactics were implemented through state welfare policies affecting unemployment benefits, housing, education, and healthcare. These reforms are often referred to as "The Keynesian Compromise." Furthermore, the dualistic climate of the postwar years, exemplified by the Cold War and the fear of communism spreading across the world, pushed US capital to make things better for the proletariat, at least in the short run, helping to fuel the Keynesian compromise.

The Keynesian policy initiatives of the postwar years alleviated some of the crises endemic to capitalism, but this band-aid would not last through the structural crises of accumulation in the 70s. On a theoretical level, the divide between Post-Keynesian economists and Neo-Keynesian economists who watered down the more radical aspects of Keynes's theories, precluded the demise of Keynesianism (also called embedded liberalism) and the rise of neoliberalism, as did the rise of the Monetarist theories of the Chicago School of Economics (Harvey 2007a; Saad-Filho and Johnston 2005). Therefore, we will now move our focus toward understanding the theoretical divides in economics that paved the way for the rise of neoliberalism.

Post-Keynesians posit that income distribution depends on institutional factors such as minimum wage, trade union power, and others, as well as the supply and demand of labor (Palley 2005). Neo-Keynesians, on the other hand, fall more toward the neoliberal, Chicago school idea that laborers, as well as capitalists, are "paid what they are worth" (Palley 2005:20-1). Another neo-Keynesian view espoused by many American economists "stated that economic rigidities were responsible for unemployment and that these

rigidities included such factors as trade unions and minimum wage laws” (Palley 2005:22). This distaste for such “rigidities” can be seen as a forerunner to the neoliberal policies of the late 1970s on. To elaborate, under the naturalistic economic view of the market as the fundamental determinant of supply and demand, it is not a very difficult case to make that labor unions and minimum wages are market distortions leading only to inefficiency. These intellectual divides, among others, opened a way to change the objectives of state policy regarding unemployment. Under a purist sort of Keynesianism, the goal of government policy is to attain *full* employment in the face of wage and price rigidity. In the newer monetarist style of economics, this goal was shifted to attaining a “natural rate of unemployment.” This shift in philosophy serves two purposes according to Palley (2005):

First, it has provided political cover for higher average rates of unemployment, which have undermined the bargaining position of workers. Second, it has offered a rationale for keeping real interest rates at a higher level, benefiting wealthy individuals and the financial sector. (P. 24)

Thus, we can see how such changes in mainstream economic theory have both philosophical and political dimensions that justify practical changes to the economy that benefit specific groups of people.

In contrast to Keynesianism, neoliberalism holds that supply and demand within a “free” market will best determine aggregate employment distribution. This is due to the purported fact that the market will not allow productive capital, including labor, to lay dormant. Furthermore, income distribution should be determined by the market and those with labor and capital to use will “get paid what they are worth” (Palley 2005:20-1). The Chicago School of economics, whose main founders include Milton Friedman, among others, states that the use of fiscal and monetary policy will merely lead to inflation. To buttress the argument that neoliberal economic theory is hegemonic in the US and abroad, we should note that numerous founders of the Chicago school have been awarded Nobel prizes in economics.

In the wake of these Keynesian theoretical divides, the monetarist economics of Milton Friedman and the Chicago School, which were based heavily on the work of Friedrich von Hayek and Ludwig von Mises, came to the fore and signaled a drastic shift

toward neoliberalism proper. These theories were proposed as reactions to the crises and contradictions that the US system dealt with in the 1970s.

Friedman's economic theory was based substantially on a resurrected version of the Quantity Theory of Money. Inflation was a huge problem in the 1970s and Friedman argued that inflation was "a purely monetary phenomenon resulting from too much money chasing too few goods" (Lapavitsas 2005:34). Rather than shooting for full employment as Keynesian theory would suggest, Friedman posited a natural rate of unemployment that would simply have to be dealt with, otherwise inflation would set in. Since the government would only create inefficiency through welfare programs under this theory, it stands to be understood what should be done with the naturally unemployed in our society.

The idea of too much money chasing too few goods meant that states had to keep the money supply low to curb inflation. While no empirical relationship between money supply and inflation was ever found, unemployment rose and a deep recession hit (Lapavitsas 2005). The recession curbed consumption and investment, which managed to slow inflation. After these monetarist failings, Robert Lucas's "new classical economics" resurrected Say's Law and the idea that markets will clear to equilibrium, unless the government intervenes. This resurrection had great implications for government policy: a fully self-equilibrating economy leaves no room for the state or its regulations. However, the state still had to resort to macroeconomic intervention over the years, for economic crises could not go uncontained. The fundamental feature to grasp is that these new theories killed the Keynesian notion that "economic intervention should aim at achieving full employment and social welfare" (Lapavitsas 2005:35). This thorough ideological shift, buttressed by economic theory, was utilized to create consent in the US and wage a class war between capitalists and workers (Harvey 2007a; 2007b).

That the creation and implementation of these theories came about during the crises of the 1970s and the signals of waning US world hegemony is no coincidence. The goal of keeping a strong dollar in the aftermath of the collapse of Bretton Woods and the shift toward floating exchange rates at the same time that US capital required more liquidity for higher profits is also not coincidental. Nor is the focus on keeping interest rates high and inflation low – both of these policy imperatives make finance more profitable. Instead,

these changes thoroughly support the contention that the US government, economic theorists, and capital supported the shift toward neoliberal globalization through the export and discursive naturalization of specific economic ideologies that were beneficial to its changing the overarching forms of accumulation from material free worldism to financial neoliberal globalization.

The shift from Keynesianism to monetarism and neoliberalism came in the decade of the 1970s due to a mixture of theoretical shifts in macroeconomics and the election of neoliberal politicians to places of great power. The breaking point of the Keynesian paradigm came in the wake of the aforementioned divide between post-Keynesians and neo-Keynesians, the oil shocks of the 1970s along with the resulting inflation, and a signal crisis of US world hegemony: US failure to win the Vietnam War. Numerous cultural factors also fostered the decline of Keynesianism in the US, though they are mostly outside the scope of this work.

Neoliberalism is a hegemonic ideology in the US and abroad. That strong statement, of course, requires much support. Neoliberalism has been integrated into the American consciousness as an objective reality through myopic political discourse, media creation oriented toward consumption and a narrow view of reality, and buttressed by the academic world. The American two-party system leaves very little room for movement from under this ideology. Though the Democratic Party tends more toward a social welfare state, neither Democrats nor Republicans stray very far from the policy prescriptions of neoliberal theory. The concentration of the ownership of the means of media production into the few hands of the bourgeoisie has been instrumental in narrowing the public discourse only to ideas that fall under the umbrella of “free” markets (Ott and Mack 2009). It seems no coincidence that the political face and primary pusher of neoliberal ideology in the 1980s was Ronald Reagan, a retired movie star.

Neoliberal theory/ideology has been set forth as a pure, objective science, proven by the many calculations of the economists and supported by numerous academic schools of thought and capitalist think tanks, such as the Mont Pelerin Society (which included such names as Friedrich von Hayek, Ludwig von Mises, and Milton Friedman), the Heritage

Foundation, the Hoover Institute, the Center for the study of American Business, the American Enterprise Institute, and the National Bureau of Economic Research.

The neoliberal ideology is hegemonic, not only in the US, but abroad as well. Margaret Thatcher, the Prime Minister of Britain during the 80s, was an avid promoter of neoliberal policy (Harvey 2007a; Chorev 2010). The “Washington Consensus” of the 1990s and its great influence over world happenings is another instance of the hegemony of the neoliberal ideology. Yet, even with consistent empirical evidence for the shortcomings of neoliberal policy, many still support its infallibility (Harvey 2007a).

In addition, the same neoliberal logic has been applied to the international economy: more “freedom” in global markets means more economic freedom for everyone in the world. But, in contradiction to the promise of a universal reduction of inequalities through participation in unregulated global markets, the outcomes for specific states and peoples, aside from those at the top, were arguably negative but varied from place to place (Harvey 2007a; Li 2008).

Furthermore, the universalizing discourses of positivist methods used by neoliberal economists in the US taken along with its general world hegemony, which includes as a subset the hegemony of its universities and academics, have led to the worldwide hegemony of the neoliberal ideology.

The social sciences have for many years based their methods on the natural sciences, which has led to the (mis)use of positivist methods in disciplines such as economics (Steinmetz 2005). As argued in the appendix, there are many differences between levels of natural and social reality and natural science methods should not be fully applied to social reality, because while social reality emerges from natural reality, it is not fully dictated by it. Social occurrences do not follow ironclad, objective laws, even though many orthodox economists treat economic reality in that way. The positivist methods of orthodox economists have been chronicled by many critical researchers (Benton and Craib [2001] 2010; Albritton 2007; 2009; Ollman 2003; Steinmetz 2005; Mirowski 2005; Mitchell 2005; Harvey 2007a; 2007b; 2010; Somers 2005; Lawson 2005; Breslau 2005). We can see the use of some positivist methods by prominent neoliberal economists chronicled in the last few pages.

Positivism and its proponents' adherence to a strong form of empiricism lead to a seeming universalization of economic *laws*. A strong form of empiricism assumes a fully objective world that can be understood through experience and the observance of consistencies which become natural laws; strong empiricism attempts to apply these natural laws to reality in an objective and universal manner (Benton and Craib 2010). Empiricism also states that values of the observer must be completely removed for the knowledge to be considered scientific, another proven fallacy (See Gerth 2007; Weber [1925] 1978; [1905] 2002; 2003). Adherence to positivist methods and epistemology also leads to intense reductionism (Schumpeter 1962) and a hard distinction between disciplines (Benton and Craib 2010; Steinmetz 2005). The distinction between disciplines and the myopic use of statistical methods are other historical factors that contribute to the hegemony of positivism and the hard distinctions between disciplines in the US (Gieryn 1983; Camic and Xie 1994). Economics is both positivistic and empiricist and therefore attempts to apply natural laws to social and economic reality, justifying its universal applicability.

Due to historical circumstances such as the use of positivism in the social sciences, positivism's reliance on strong empiricism, and the universalizing nature of empiricist assumptions, economics has become a sort of universalizing social science discipline – it attempts to place all economic occurrences on a universal plane, defined by professional economists. When these factors are mixed with the world hegemony of the US and the hegemony of the neoliberal economic ideology within the US, neoliberal ideology tends toward hegemony. We are referring here to the more economically oriented aspect of the neoliberal ideology, but there are also political-ideological and practical aspects that have helped neoliberalism as a whole become world hegemonic. The hegemony of the neoliberal political-economic ideology worldwide is buttressed in practice by US-run IFIs like the World Bank and the IMF and transnational corporations acting in and creating a worldwide “free” market system (Arrighi 2010; Harvey 2007a; 2007b; 2010; Robinson 2004).

When globalization, financialization, and the neoliberal ideology move together the expansion of neoliberal ideas and the “natural” creation of “free” markets across the world comes to the fore. Transportation and communication costs have been lowered and social

space-time has been compressed by new technological innovations like the airplane and the internet, furthering the capacities of the transnationalist capitalist class to move capital around the globe with never before seen efficiency. Colás (2005:73) puts it well:

“Globalization is... seen by most neoliberals as a natural outcome of an untrammelled capitalist market; as a positive process which unfolds smoothly once artificial distortions created by the state, political interests or archaic customs are removed from the path of free and equal exchange.” Once again, we can see an ideology stating that markets are natural structures of the world and that agents acting rationally and self-interestedly within them for profit will “make all boats rise.”

Critical globalization theorists tend to take a Marxist, Polanyian, or Gramscian view of globalization (Arrighi 2010; Colás 2005; Harvey 2007a). This critical view points to the political necessity of states to create markets and the conditions for them, as well as the hegemonic nature of market creation (Gramsci and Arrighi), the unnatural aspects of markets (Polanyi), and the recreation of social relations that go hand in hand with changing economic structures (Marx). The uneven geographical nature of this phenomenon becomes quite apparent when looking at how different states have dealt with neoliberalism (Colás 2005; Harvey 2007a; Li 2008). The use of US led IFIs like the World Bank and the World Trade organization to loan money to peripheral nations and change their economic policies also pushed globalization, financialization, and neoliberal ideology throughout the world (Colás 2005). The collapse of non-capitalist economies such as the Soviet bloc in 1989 seemed to fortify the idea that capitalism is the best and only road, prompting Fukuyama to proclaim the “end of history” and the final success of capitalism (Fukuyama [1992] 2006).

In summation, the globalization of production necessitates more flexible forms of capital and labor, the financialization of the global economy gives the means by which capital can become more liquid, and the hegemony of neoliberalism gives the political and theoretical justifications necessary for changes to the relationship between the state, the economy, and labor, as well as the policy practices that go along with such changes. These transformations happened initially in the US, the most advanced capitalist country, and, through its world hegemony and other historical circumstances such as capitalism approaching its extensive growth limits, such transformations changed the entire world.

Now that we see how neoliberalism as an ideology and practice has occurred alongside and legitimized or reinforced globalization and financialization tendencies in the economy, it is time to move on to the more specific policy changes that took place over the 20th and 21st centuries in the US that led into the financial crisis. A study of the evolution of the US banking system since the Great Depression and the role of derivatives in the financial crisis and the global financial economy will make up the next chapter. With these new turns and layers we will flesh out the long-term historical factors that led to the crisis and begin to theorize the deeper transformations that such a watershed moment will bring upon the world system.

The Financial Crisis

It seems now that federal policies mitigated the crisis for the time being. Most analysts now refer to it as a recession rather than a depression. But, seemingly benign attempts to stall crises tend to cover up surface problems while leaving the deeper causes intact. Though the crisis has been stalled for the moment, unemployment is still high, global production levels have not fully recovered, and many governments spent a great deal of money to avoid catastrophe (Davies 2010; FCIC 2011; Callinicos 2010). Some of these countries now face the possibility of sovereign debt crises – even the juggernaut that is the US. The crisis will have lasting effects on the global economy and deserves a deeper look into its many causes.

One of the biggest issues in understanding the financial crisis comes from attempts to lay primary blame on specific people or sectors when practically all sectors in the US and even many from abroad contributed to the crisis in some way. Virtually everyone has been integrated into the financialized accumulation processes and thus blame can be put almost anywhere.

The US government can be blamed for its juridical role in creating the new financial architecture and the resulting perverse incentive structures, as well as for its role in the overall increase of government debt. Financial investors can be blamed for their participation in the “originate and distribute” and “slice and dice” models, for creating huge leverage ratios, and for creating banks that are “too big to fail.” The Federal Reserve can be blamed for its creation of a perceived low-risk environment and low interest rates in the

US. Recently industrialized countries like China can be blamed for creating a global savings glut that fostered the crisis by pushing down interest rates and pushing the US to act as a global sink for overaccumulation through debt-financing. Academics can be blamed for their lacking ability to predict and analyze what is happening in the macroeconomic system. And the US public can be blamed for their participation in the housing market and refinancing, as well as their use of credit cards and the like to increase personal debt.

In contrast, I argue that while the crisis is certainly multicausal, the blame should be put squarely on the workings of capitalism itself. The reason why so many people helped to create the crisis is that they all must participate in capitalist accumulation in some way. Though governments can attempt to mitigate problems for a time, actions taken toward that mitigation merely deal with surface symptoms of the problems, not the deeper problems of accumulation themselves. These actions tend only to stave off the crises that are virtually inevitable under such a structure. It is not the financial crisis itself that is important. On the contrary, the deeper historical logics that led into the crisis hold primacy.

In this chapter we delineate the numerous causes of the financial crisis and how they relate to broader transformations of the capitalist system. In his book *The Financial Crisis: Who is to Blame?* (2010), Howard Davies, the former director of the London School of Economics, identifies thirty-eight strands describing causes of the financial crisis. We will touch on the majority of these while adding a few of our own, breaking the analysis down into three major groups of causes: (1) changes to the US banking industry since the Great Depression, (2) structural and organizational changes from the last few decades that led the US to financialize its economy and utilize financial derivatives, and (3) more proximate tools and actions that led into the crisis.

First, we will outline some of the juridical and structural changes that have occurred in the US banking system since the Great Depression that lead into the crisis, what Crotty (2009) calls the creation of the *new financial architecture*. These include the creation of the shadow banking industry and the dismantling of the Glass-Steagall Act. The breakdown of these regulatory schemas blurs the lines between commercial and investment banks and allows them to take part in more risky, uninsured loans than they could under immediate post-depression law.

We will then move on to describe the more proximate tools and institutional practices that helped to create the crisis in the US through the lens of derivatives. These circumstances, tools, and practices helped to create the housing bubble and the ensuing liquidity crisis which are commonly seen as the real triggers of the crisis. Fannie Mae, Freddie Mac, and other investors “managed” risk with derivatives and used the *originate and distribute* and *slice and dice* models to create and distribute mortgages. These models and the incentive structures in the mortgage industry, along with other circumstances, led to the mispricing and spread of risk to sectors outside the mortgage industry and the failure of many banks.

In addition to describing these causes, we will question the role of derivatives in the financial crisis itself and posit that their wider role in the global financial system amounts to more than what a short-term crisis-oriented view can provide. Following Bryan and Rafferty (2006), I theorize derivatives as more than just managers of risk or forms of speculative “fictitious” capital, for the increased use of derivatives points to subtle transformations in the global economy that may have effects that echo through the 21st century.

The New Financial Architecture

The *new financial architecture* (NFA) is the matrix of US law, banking practice, and political-economic ideology that underpins the financial crisis (Crotty 2009). The previous chapter showed how neoliberalism, globalization, and financialization reinforce each other to create vast changes in the structures and logics of the global economy. This chapter continues a similar investigation, but with a more domestic focus on how juridical, policy, and organizational changes transformed the banking and financial systems within the US, leading into the financial crisis through increased use of new financial instruments, the housing bubble, and mispriced risk in the global financial system.

In the aftermath of the Great Depression the US government realized that regulation of its large financial institutions was necessary to avoid future catastrophes. Thus, it put into place a regulatory regime to limit the risks of financial institutions and curb speculative manias that could lead to great systemic risk (Crotty 2009). The

implementation of the Glass-Steagall Act was a fundamental piece of this new regulatory regime that has since been dismantled. The repeal of post-Great Depression-era laws created a shadow banking industry, allowing banks to participate in more risky endeavors than they could in the early part of the 20th century.

The Glass-Steagall Act was put into place in 1933 as a reaction to bank runs and the ensuing collapse of numerous commercial banks in the US. It created the Federal Deposit Insurance Corporation (FDIC) to insure bank deposits, thoroughly mitigating future runs on banks. Glass-Steagall also separated banks according to the types of business they did; commercial banks, which generally deal with deposits and consumer or commercial loans, were no longer allowed to deal in capital market activities, for “the use of bank deposits to finance speculative capital market activity” helped to create many problems leading to the Great Depression such as bank runs (Crotty 2009:5). After the Great Depression, the insurance of deposits by the newly formed FDIC alleviated consumer fears of losing their money to the banks in the post-Great Depression era. Investment banks, on the other hand, were allowed to deal in capital markets, but only with regulations from the Securities and Exchange Commission (SEC). By limiting commercial banks to consumer and commercial loans and forcing them to both originate and retain those loans, the Glass-Steagall Act gave incentives for commercial banks to limit their risks, since banks originating such loans would end up with the profits or losses attached to them. In the most recent financial crisis many loans were originated by one bank, then repackaged and sold off to other investors. This led the originators to worry less about the final repayment of the loans and focus more on the profits gained by originating them, increasing the risk of nonpayment.

These regulations helped to usher in the “golden age” of capitalism by creating great stability in the financial sector of the US, though there were many unintended consequences that are manifest today. A particular unintended consequence of such regulation was the creation of the shadow banking system, an unregulated financial market that exists alongside the traditional banking system (Crotty 2009; FCIC 2011).

In the search for greater profits in the face of rising interest rates and the price shocks of the 1970s, commercial banks found new avenues for higher returns on their investments in alternative markets that sidestepped the regulations of the Glass-Steagall Act (Crotty

2009; FCIC 2011). The creation of commercial paper and repo markets and their ascension in the 1960s fed into the shadow banking system. After the Great Depression, the Fed capped interest rates at 6 percent to discourage banks from taking great risks. While the market was stable and interest rates were not very high, this system worked well, for commercial banks could stay relatively profitable within those interest rate restrictions and compete with the less regulated investment banks. In contrast, when inflation and interest rates rose above 6 percent in the 1960s, commercial banks began to search for new, innovative ways of investing to make profit through lending. An alternative market to the more regulated traditional banking industry was created with assets like money market mutual funds as the commodities. Money market mutual funds were initially restricted to highly rated and highly liquid debt and could be used to limit losses from credit, market, and liquidity risks, but through the years capital requirements and restrictions on them were watered down immensely (FCIC 2011). Over the years this market grew and assets in such funds “jumped from \$3 billion in 1977 to more than \$740 billion in 1995 and \$1.8 trillion by 2000” (FCIC 2011:30). The commercial paper markets were not insured by the FDIC. Instead, they were backed by large corporations that were considered “good for the money” such as General Electric and IBM. Corporate backing of financial markets by large, normally materially productive companies is an example of the integration of new actors into the financial system.

The repurchase agreement or “repo” market came to be a larger part of the industry in the 1960s as well. This was a market in which corporations bought treasury bonds at low interest rates, sold them to banks, and invested the money at higher returns in securities. Both markets made it easier for corporations to loan and borrow money at profit on a short-term basis. These new shadow markets made for an increase in new forms of financial asset holdings, but a loss in traditional bank assets that were federally insured and highly liquid (FCIC 2011). Since these new assets were not federally insured, the government did not feel the need to substantially regulate them – in a “free” market, failure was simply failure since contracts were seen as agreements between two consenting parties that, in theory, knew the risks involved. As more and more investors participated in these alternative markets risk rose, not only for individual investors, but for the financial

and economic system as a whole. With laws and regulations for traditional FDIC insured banks and a non-regulated market for Wall Street firm investment, one can see the interest for investors to participate in the latter, especially when looking for particularly high returns in the face of a stagnating productive economy. *Figure 1* below shows that the amount of money in shadow banking has risen mostly in step with traditional banking since the 1980s. The makeup up of bank investments overall became less liquid due to new riskier investment opportunities under lax regulation (FCIC 2011). The shift from traditional investments to riskier, uninsured investments meant that banks could make higher profits in good times, but in times of panic, low liquidity, or a flight to quality these banks would be left with unsellable investments.

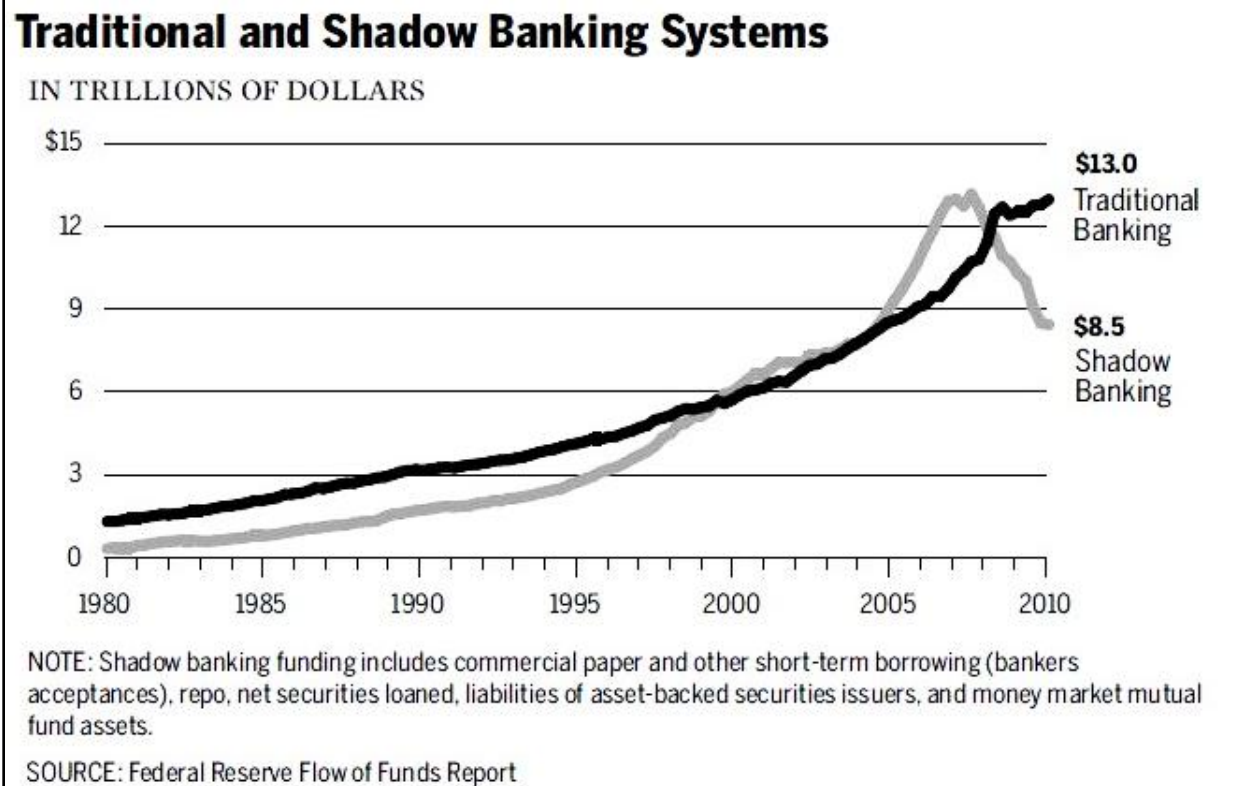


Figure 1: The Rise of the Shadow Banking System

Source: *Financial Crisis Inquiry Report 2011*; p. 32

After the Great Depression of the 1930s, the US legislated and regulated banks much more heavily to reduce risk in the system as a whole. With Americans and the rest of the world reeling from the economic catastrophe, it was obvious that greater measures had to be taken regarding regulation of the finance and the banking industry. Regulation Q let the Fed regulate interest rates on savings accounts, which helped to create the shadow banking system mentioned above, though this act was repealed in 1980 by the Depository Institutions Deregulation and Monetary Control Act of 1980 (FCIC 2011).

In 1987 the Fed began to dismantle the Glass-Steagall Act that regulated the workings of banks since the Great Depression, attempting to give traditional or commercial banks back some of the competitive advantage that had been lost to the shadow system. The separation between commercial and investment banks that was the cornerstone of Glass-Steagall was incrementally removed by both the creation of new financial instruments that sidestepped such regulation and by deregulatory policies. According to the FCIC, “(the) new rules permitted nonbank subsidiaries of bank holding companies to engage in ‘bank-ineligible’ activities, including selling or holding certain kinds of securities that were not permissible for national banks to invest in or underwrite” (2011:35). Even after a number of commercial bank and thrift failures in the 1980s and 1990s and the ensuing \$160 billion in government cleanup costs – commonly known as the savings and loan crisis – deregulation continued. After shadow markets and deregulation continued for years, Paul Volcker told the Financial Crisis Inquiry Commission (FCIC), “There was no regulation.... It was kind of a free ride” (FCIC 2011:33).

In 1991 congress passed the Federal Deposit Insurance Corporation Improvement Act (FDICIA) which gave the FDIC more ability to regulate banks’ capital requirements and also attempted to limit the “too big to fail” principle, which allowed for the use of taxpayer funds to bail out failing banks. But, two gargantuan loopholes were left: if the treasury and the Fed “determined that the failure of an institution posed a ‘systemic risk’ to markets,” the FDIC would *not* be forced to curb the use of taxpayer funds to fix the problem (FCIC 2011:37). Also, “Wall Street firms successfully lobbied for an amendment to FDICIA to authorize the Fed to act as lender of last resort to investment banks by extending loans collateralized by the investment banks’ securities” (FCIC 2011:37). Thus, even though the

state is very limited in its economic interventions under the new orthodoxy of economic theories, it is still given the task of stepping in as the lender of last resort when systemic risks become apparent. So under this logic, the state can step in, not to limit systemic risk throughout the process, but only when those systemic risks become so problematic that the entire financial system is in jeopardy. This role for the state is one of the few that neoliberal economic theory allows for and, after seeing the results of the most recent financial crisis, it becomes obvious that such an obligation has dire consequences for US taxpayers. It almost seems as though many financial capitalists realized that the state would step in to help out in a time of systemic crisis, regardless of the risky actions that such investors might have taken, since many of the banks involved posed systemic risk to the economy as a whole due to their great size.

The removal of barriers between commercial and investment banks helped to further merge banks into larger and larger entities. “Because we had knocked so many holes in the walls separating commercial and investment banking and insurance, we were able to aggressively enter their businesses....” stated Edward Yingling, CEO of the lobbying organization The American Bankers Association (FCIC 2011:54). Through larger, more diverse, and more efficient banks, some economists argued, banks could alleviate risks, gain from economies of scale, and would be better able to serve the economy as a whole.

Thus,

Between 1990 and 2005, 74 ‘megamergers’ occurred involving banks with assets of more than \$10 billion each. Meanwhile the 10 largest jumped from owning 25% of the industry’s assets to 55%. From 1998 to 2007, the combined assets of the five largest U.S. banks – Bank of America, Citigroup, JP Morgan, Wachovia, and Wells Fargo – more than tripled, from \$2.2 trillion to \$6.8 trillion.... The assets of the five largest investment banks – Goldman Sachs, Morgan Stanley, Merrill Lynch, Lehmann Brothers, and Bear Stearns – quadrupled, from \$1 trillion in 1998 to \$4 trillion in 2007. (FCIC 2011:52-3)

The mixture of bank mergers, deregulation, and the loopholes of FDICIA would prove to be catastrophic, for they helped to create great systemic risk in both the US and global economies. As we will see shortly, many banks benefitted greatly from these changes, for the loopholes in FDICIA were exercised to award taxpayer money in the bailouts after the

crisis, in effect socializing the costs of the crisis while allowing the profits to stay with the investors who made poor decisions.

Many regulators and legislators also approved of the deregulation of financial markets because they assumed that financial institutions had strong incentives to protect shareholders and regulate themselves. They also assumed that the financial market would further discipline them through “analysts, credit rating agencies, and investors” (FCIC 2011:35). The FCIC report quotes two big players in the game: “... Fed Vice Chairman Roger Ferguson praised ‘the truly impressive improvement in methods of risk measurement and management and the growing adoption of these technologies by mostly large banks and other financial intermediaries,’” while Fed Chairman Alan Greenspan noted that

It is critically important to recognize that no market is ever truly unregulated.... The self-interest of market participants generates private market regulation. Thus, the real question is not whether a market should be regulated. Rather, the real question is whether government intervention strengthens or weakens private regulation. (FCIC 2011:53-4)

The words uttered by these two Fed heavyweights exemplify some of the failures of economic theory that led to the crisis. First, the adoption of new financial technologies and risk management did not limit risks as many thought they would; many economists and investors assumed that such technologies and theories would hold true even in times of market panic and low liquidity. History now shows they have not. Secondly, perverse incentive structures throughout financial commodity chains, among many other issues, soon proved Greenspan’s steadfast reliance on the self-regulation of the market – an obviously neoliberal ideology – to be false. These perverse incentive structures will be elaborated soon. Additionally, lobbying for changes in financial regulation practically became an industry in itself: “From 1999 through 2008, federal lobbying by the financial sector reached \$2.7 billion; campaign donations from individuals and PACs topped \$1 billion” (FCIC 2011:55). Through immense lobbying efforts and further integration of capital into politics, laws changed in the interest of financial capital, not in the interest of US society.

The dismantling of Glass-Steagall and the creation of the shadow banking industry allowed banks and investors to do whatever they thought would get them the most profit,

even if they were walking the same lines as those who created the Great Depression. As banks merged into entities too big to fail and financiers continued to invest in uninsured, unregulated assets, individual risk changed into systemic risk and the financial sector in the US became unstable.

Derivatives and speculative bubbles are commonly noted to be fundamental pieces of the financial crisis puzzle. But, rather than merely viewing derivatives as simple risk management tools or as examples of the creation of fictitious or speculative capital that led to the crisis, we should also look at derivatives as a transformation of capital itself that could have far-reaching consequences for the future workings of the global capitalist system.

Derivatives in the Financial Crisis

There can be no doubt that derivatives make up one of the most fundamental causes of the financial crisis. Yet viewing derivatives only as a form of speculative capital or as a novel way of hedging risk in the grand casino of 21st century capitalism leaves them woefully under-theorized, for they perform numerous functions in the global financial economy and these functions may become more and more pronounced over the coming years (Bryan and Rafferty 2006). Looking at derivatives with too myopic a perspective skews the analysis and makes them seem like only an upgrade to capital's bubble blowing machine. Similar to the foundational aim of this work, it is the long-term macro-historical evolution of derivatives that is far more important to comprehend than their short-term role in the crisis. Understanding that short-term role is fruitful, but only when placed in the greater historical context.

The creation of complex financial instruments, especially derivatives, make for a subtle transformation in capitalism and require much more theorizing than they have received in most literature from the social sciences. To deal in earnest with derivatives, we must deal with them not only from an economic or financial perspective, but with a political-economic and historical lens. The creation and evolution of complex financial instruments, specifically derivatives, is multicausal. It is in part an outgrowth of the shadow banking industry and the attempts of banks to sidestep regulation. It is also a result of the

US's switch in its style of accumulation to neoliberal globalization and financialization. More interesting though, the creation of derivatives is the result of capital's search for an anchor to the global financial system that is not found in nation-state money. Derivatives are also an expression of capitalism's general tendency toward increased competition. The need for supranational money arises in the wake of the failure of the Bretton Woods system and the oil shocks of the 1970s, which led to a system of floating exchange rates that must be accounted for under the auspices of highly competitive global trade. Put bluntly, the globalized economy requires a supranational form of money to deal with globalized accumulation processes. There is no such thing at the moment, but derivatives can fulfill many of the functions of a global form of money (Bryan and Rafferty 2006). I will return to this point soon.

First, a look at how derivatives are commonly theorized and what derivatives actually are is necessary because they are generally poorly understood. Secondly, derivatives' direct role in the financial crisis must be elaborated for it is through derivatives and the ways they were distributed that the housing boom and bust added fuel to the fire of an already unstable financial system that ended in the conflagration that is the financial crisis.

Derivatives have been sorely under-theorized by social scientists up to this point, even though they make up a huge percentage of global financial transactions today (Bryan and Rafferty 2006; Callinicos 2010; Foster and Magdoff 2009; FCIC 2011). Orthodox economists have so far viewed derivatives as risk management tools that allow investors to "slice and dice" their risks, repackage them, and sell them off to those who want specific kinds of risk (See Greenspan in FCIC 2011). On the opposite end of the spectrum, Marxist theorists tend to merely relegate derivatives into the category of fictitious commodities that push the economy past its limits, creating bubbles that do not relate to the so-called "real" economy (Foster and Magdoff 2009). Much of the problem is due to the different foci of fragmented disciplines; this fragmentation leads to an inability to understand finance in a thoroughly globalized economy.

Financial bubbles and the volatility of the market are hard to comprehend through the equilibrium focused lens of neoclassical economics without adding in post hoc models of distortion (Bryan and Rafferty 2006). Previously, we saw that neoclassical or monetarist

economics attempt to abstract away socio-historical circumstances that change the workings of the economy over time – a fact that crucially limits the analysis. Most economists did not foresee the financial crisis due to their theories and empirical data being based almost solely on boom times with rising housing prices. Furthermore, accounting practices for businesses that sell derivatives have not caught up with the actual practices and consequences of selling derivatives. Accounting failures led in great part to the market shocks, for the actual debts of many companies were unknown (Stiglitz 2010; FCIC 2011).

Keynesian views treat finance as a very nationally-oriented phenomenon in which nation-states, acting as separate units with separate monetary systems, interact with each other through the world market and have more agency in monetary policy than is actually the case. The Keynesian view is not wholly untrue, but cannot serve in understanding finance as an inherently global phenomenon that transcends national borders. In the globalized system of finance, politics and the strength of economies matter, but recent changes to production processes like the rise of corporations as horizontally integrated transnational entities blurs the line between nation-states as the foremost or only containers of power (Robinson 2004). Derivatives' ability to blend different forms of nation-state money through exchange rate calculations elevates them to a level above that of national money.

And though Marxian analysis utilizes socio-historical context to understand the transformations of the world system, many Marxists jump far too quickly to condemn finance to a mere grand casino of capitalism, rather than attempting a more thorough analysis (Bryan and Rafferty 2006; Foster and Magdoff 2009). In the Marxist tradition derivatives and securitization are commonly seen as fictitious forms of capital that serve to blow the bubbles that the financialized economy is increasingly based upon. Viewing derivatives in such a way makes them seem like mere toys for fictitious profit-making when they are actually deeply integrated tools that facilitate the workings of the global financial system – they may even change the way we view ownership in a way similar to the advent of the joint-stock company and the modern corporation (Bryan and Rafferty 2006). It is safe to say that derivatives will not go away any time soon, for they have

become an integral part of the workings of the system as a whole. Thus, a further understanding of derivatives will be helpful in understanding both the crisis itself and the underlying capital accumulation processes of the 21st century.¹⁸

Derivatives in general perform two main functions: *binding* and *blending* (Bryan and Rafferty 2006). Bryan and Rafferty (2006) define these functions of derivatives succinctly:

Binding: Derivatives, through options and futures, establish pricing relationships that “bind” the future to the present. Derivatives bind the present to the future. (For example, the current price of wheat and the future price of wheat are mutually determining.)

Blending: Derivatives, especially through swaps, establish pricing relationships that readily convert between (or commensurate) different forms of asset. Derivatives blend different forms of capital into a single unit of measure. (They make it possible to convert things as economically nebulous as ideas and perceptions, weather and war into commodities that can be priced relative to each other and traded for profits.) (P. 12)

The definition and role of derivatives has changed over time and will continue to change; they have moved from commodity-based derivatives to financially-based derivatives and have come to play a significant role, not only in the financial crisis, but in the relationship between labor and capital (Bryan and Rafferty 2006). Instead of a static definition, derivatives should be defined as a process moving through time, for they have gone from playing a marginal role in the economy to becoming a fundamental aspect of its workings, or in the case of the financial crisis, its failings.

To start, derivatives were, prior to the 1980s, used mostly to lock in the prices of commodities over time and manage the risks associated with price volatility in those commodities (Bryan and Rafferty 2006). A wheat farmer and a flour miller may both want to exchange wheat at a future date, but they may also want to lock in the price of wheat so

¹⁸ The work and primary theoretical perspective of Neil Fligstein (1993; 1996; 1997; 2001; 2008a; 2008b; 2010; Fligstein and Mara-Drita 1996; Fligstein and Dauter 2007; Fligstein and Goldstein 2010), an economic sociologist, is a promising exception to the models listed above. His political-cultural approach to understanding markets (Fligstein 1996), though in its infancy relative to other more popular perspectives, may lead to analyses that sidestep many of the problems of Keynesian, neoclassical, or Marxist market models and allow for social-theoretically grounded, nuanced empirical research that gets at the dynamics of market processes by delineating the social construction of markets and how institutions and people act within them. Though the project at hand focuses on the long-term histories that led to the crisis, reconstructions of the financial crisis with a smaller temporal scope would benefit greatly by taking Fligstein’s work into consideration. See especially Fligstein and Goldstein’s (2010) chapter on the creation of the mortgage securitization crisis.

they can make more solid decisions regarding their businesses. They could sign a *forward* contract stating that the miller will buy a certain amount of wheat for a certain price at a later date. While this locking in of price may seem like a zero-sum game since one person will win and one will lose depending on whether the final market price is higher or lower, the forward contract gives both parties a certain security in the future transaction and their business decisions along the way. *Options* are, in essence, an optional futures contract. They allow a buyer to purchase *the right* to buy a commodity at a certain price at a later date, but do not require them to do so. The buyer may later decide not to exercise the option due to lower demand for the commodity or lower prices in the spot market and they may lose money from the purchase of the option. But, the buyer was still able to limit the risks associated with price volatility.

The term *derivative* comes from the nature of these transactions – the prices of options and futures "'derive' from prices in the spot market" and these prices are considered to be the "real" value of the commodity at that time (Bryan and Rafferty 2006:45). Commodity forms of derivatives perform the binding function by linking the present to the future and allow their users to either hedge the risk of price volatility or to take on that risk through speculation.

Derivatives were in a commodity based form for most of their existence which kept their use relatively marginal until the 1980s. Throughout the 1970s and 1980s a number of historical factors contributed to the rise and importance of derivatives in the global economy. The collapse of the Bretton Woods Agreement moved the world economy to floating exchange rates and the oil shocks of the 1970s exacerbated price volatility. One of the functions of derivatives is to limit exchange rate and price volatility. Finance grew in importance due to the US's search for more liquid capital, the globalization of accumulation and distribution processes, and the financialization that facilitates transactions between nations. Globalization created more exposure to competition through increased capital flows and the multinational or transnational firm became a fundamental actor in the world-system. The globalization of the production process itself further increased the international flows of input commodities within each output commodity chain (Robinson 2004). These occurrences created more volatility in markets and derivatives allow for the

manipulation of that volatility. However, explaining derivatives only through volatility leaves us with too small a view of their significance (Bryan and Rafferty 2006).

Derivatives not only bind the present to the future, but also blend the features of assets into many conglomerations. In this context, *swaps* come to the fore as financially oriented derivatives that “help to blend all interest rates and currencies into a single market” and allow companies to swap exposure based on their specific needs (Bryan and Rafferty 2006:49). Take for example a company that is moving into a new national market:

The firm may borrow funds at the globally lowest cost in whatever currency and term structure (fixed or floating) it can get its best deal. The firm can then swap the borrowing into the desired currency and term structure that best matches the firm’s other exposures. Banks (either indirectly or as an intermediary) can then find another borrower with the opposite borrowing needs to swap the (net) interest rate payments. Overall, the effect is that by both parties borrowing at the lowest cost and swapping repayment obligations, both parties finish up with lower interest rate costs. (Bryan and Rafferty 2006:49)

Thus, swaps not only bind the present to the future, but blend different sorts of assets together, such as loans and currencies, and, in theory, allow firms to operate more efficiently around the world. These features led Greenspan to state that “... by far the most significant event in finance during the past decade has been the extraordinary development and expansion of financial derivatives” (quoted in FCIC 2011:48). Greenspan was partially correct in recognizing the significance of derivatives, but his emphasis on “... the fact that the OTC markets function quite effectively without the benefits of [CFTC regulation]” would soon be proven wrong (quoted in FCIC 2011:48). Analyses of the ability of derivatives to mitigate risk happened throughout boom times when derivative contracts were liquid and easy to sell on the open market. At the onset of the crisis though, markets dried up and previously opaque risks became more apparent, derivatives became harder to sell and lost much of their value.

Credit default swaps (CDS) are an over-the-counter traded form of derivative that offer the buyer protection against default on loans. The buyer of a CDS is, more or less, purchasing insurance in the case of default on a certain loan. If a loan defaults, the seller of the CDS pays the buyer an agreed amount. This form of derivative made up a substantial

piece of the financial crisis puzzle, for CDS are not heavily regulated and allow for hefty leverage ratios. The largest banks in the US make up the vast majority of traders of CDS and hold a substantial portion of their assets in these derivatives: JPMorgan Chase, Citigroup, Bank of America, Wachovia, and HSBC traded 97 percent of OTC derivatives in 2008 (FCIC 2011). Goldman's mortgage department stated that 86 percent of its trades from May 2007 through November 2008 were derivative transactions (FCIC 2011). Thus, trading derivatives makes up a substantial portion of the transactions of large banks in the US.

CDS are usually viewed as insurance against default on an underlying asset:

The purchaser of a CDS transferred to the seller the default risk of an underlying debt. The debt security could be any bond or loan obligation. The CDS buyer made periodic payments to the seller during the life of the swap. In return, the seller offered protection against default or specified "credit events" such as a partial default. If a credit event such as a default occurred, the CDS seller would typically pay the buyer the face value of the debt. (FCIC 2011:50)

However, in this form of "insurance," investors can speculate on the defaults of commodities not owned by them – the buyer and seller do not have to have any interest in the underlying asset; they are able to speculate on the *attributes* of an asset rather than the asset itself (Bryan and Rafferty 2006). This fact contributes to Bryan and Rafferty's (2006) conceptualization of derivatives as *metacapital*, for the nature of capital ownership changes greatly with derivatives, a point elaborated later. Furthermore, there are no reserves necessary to hedge exposure, so no actual collateral is necessary. AIG accumulated five-hundred billion dollars of credit risk without posting any collateral or provisions for loss (FCIC 2011). CDS allow investors to bet on defaults on loans. In other words investors can hedge and limit their losses if something goes awry by purchasing CDS. CDS can limit losses in some circumstances, leading to the idea that new financial instruments allow for less risk overall, but under a system with perverse incentive structures and large crises that affect liquidity in the system as a whole, CDS become sorely ineffective.

If derivatives are so powerful in managing risk – an idea commonly held by many economists – how did they contribute so much to the financial crisis? The answer is that they were thoroughly misused and under the circumstances – such as perverse incentive structures and theories that deal only with individual risk and not market risk – derivatives

did not perform their functions well. Derivatives, on a surface level at least, are one of the most substantial causes of the financial crisis. The risks related to subprime lending in the US market were sliced, repackaged and then sold throughout the world to bidders who wanted to take higher risks and receive higher returns. These buyers assumed that the risks were worthwhile. Why? Because, in light of much recent and highly regarded economic theory on risk management, it seemed that the risks were either spread thin through the use of complex financial instruments or at least sold to investors who were willing to take such risks for higher returns. Though derivatives can and have performed their function as managers of risk in some instances, the economic theory used to calculate their prices is abstract and anti-historical, leading to a myopic view of derivatives. Furthermore, the incentive structures within the US economy, especially those relating to the housing and mortgage industry, were highly perverted and led to the misuse of derivatives and a failure of one of their main functions: binding the present to the future. We will now elaborate these points more fully through a discussion of an oft-cited proximate cause of the crisis: the US housing bubble.

While derivatives are a great part of the financial crisis, it is their misuse under perverse incentive structures, the inability to price and rate them correctly, and the overall lacking theorization of derivatives that contributed to the financial crisis, not necessarily the form of derivatives themselves. We should not downplay the nefarious aspects of derivatives though, for the consequences of their increased use may be dire (Bryan and Rafferty 2006; Bryan, Martin, and Rafferty 2009). Derivatives express the innate tendency toward increased competition under capitalism.

Creating the Housing Bubble: Perverse Incentives

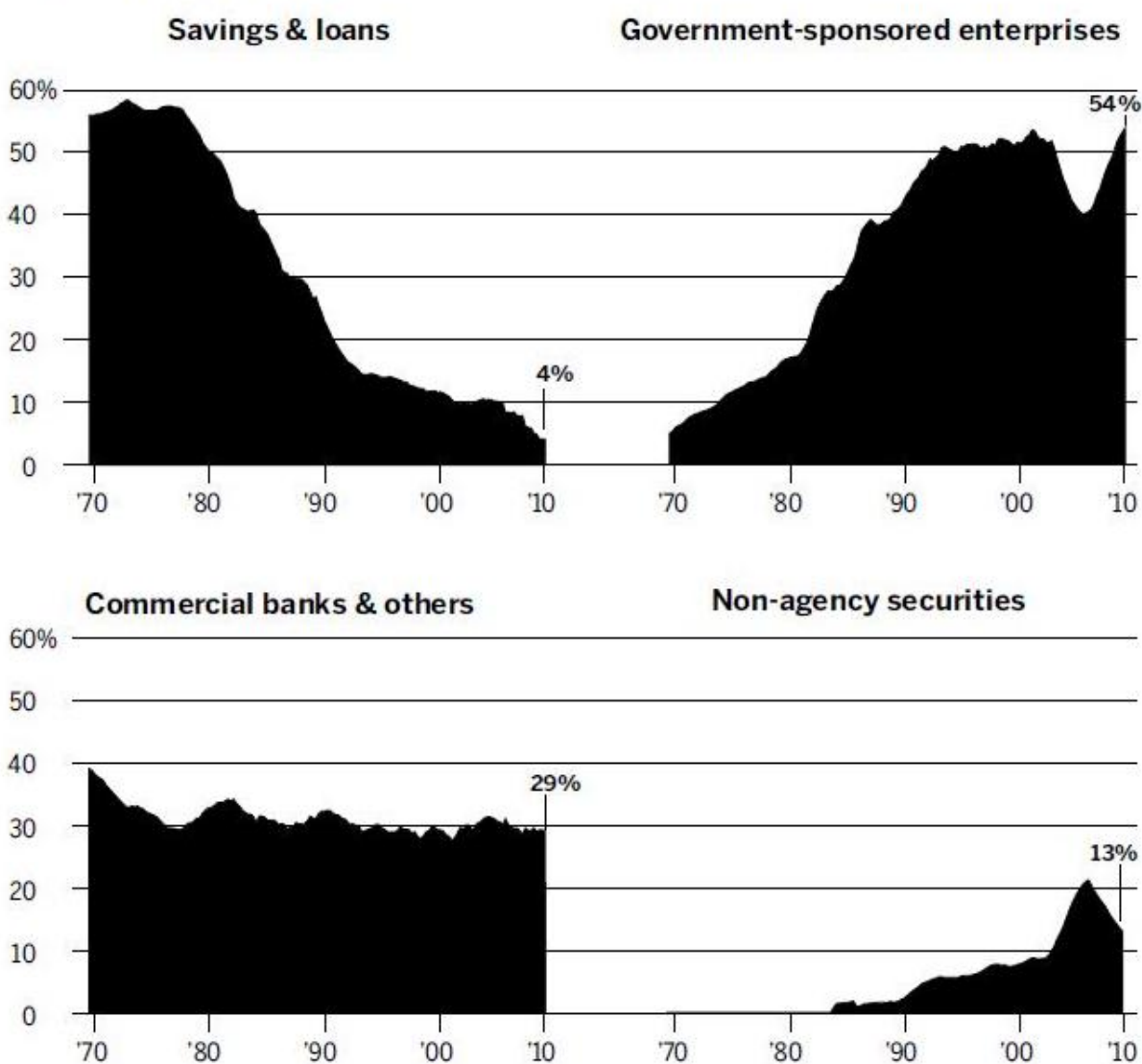
The housing bubble in the US is widely perceived as the greatest contributing factor to the financial crisis. In contrast, the housing bubble is merely a surface manifestation of problems endemic to capitalist accumulation itself. The housing bubble was supported by changes in the structure of the banking system outlined above, political support for home

ownership from all presidential regimes (Republican and Democrat alike),¹⁹ and the integration of everyday American consumers into financial markets. These factors led outstanding debt in the US credit markets to triple “during the 1980s, reaching \$13.8 trillion in 1990; 11% was securitized mortgages and GSE debt” (FCIC 2011:68). GSEs are government sponsored enterprises like Fannie Mae and Freddie Mac. *Figure 2* below shows the makeup of sources of mortgage funding, especially the massive rise in GSE funded mortgage debt. The rise in GSE funded mortgage debt further supports the idea that roles played by the government, the financial sector, and regular people all combined together as great contributing factors to the crisis.

¹⁹ Politicians on both sides of the aisle supported an increase in home ownership and, implicitly, increases in the personal debt of US people. Both Clinton and G. W. Bush pushed home ownership as fundamental to the American middle class. Home “ownership,” or rather increasing personal debt, expanded the realm of finance to include the American middle class, for few people actually own their homes; instead they get loans to acquire them. Subprime mortgages would later extend such options to the lower classes of the US, all with great consequences (Callinicos 2010; FCIC 2011).

Funding for Mortgages

IN PERCENT, BY SOURCE



SOURCE: Federal Reserve Flow of Funds Report

Figure 2: Funding for Mortgages

Source: *Financial Crisis Inquiry Commission 2011; p. 69*

Increased access to credit for everyday people in the US fuelled household consumption in the face of stagnating wages. Rising home prices, ownership of a home being the largest investment for most Americans, kept the housing market booming and kept bank investments like securitized mortgages liquid. Rising home prices also helped these Americans to feel more financially sound, because their investment continually rose in value over the years as evidenced by *Figure 3* below, though such rises were not inevitable and would end in catastrophe for many. Mortgage debt also rose because in the wake of the dot.com bubble the Fed lowered interest rates to keep liquidity in the system up. In an environment of low interest rates, rising house prices, and stagnant real wages, many in the US public turned to home ownership and refinancing as ways to increase their wealth and living standards. Rising home prices and lowering interest rates can be seen in *Figure 3* and *Figure 4* below. Results include increases in consumer spending and a drop in the savings rate. Thus, from 2001 to 2007 mortgage debt almost doubled. According to the FCIC (2011), “Household debt rose from 80% of disposable personal income in 1993 to almost 130% by mid-2006. More than three-quarters of this increase was mortgage debt” (pp. 83-4).

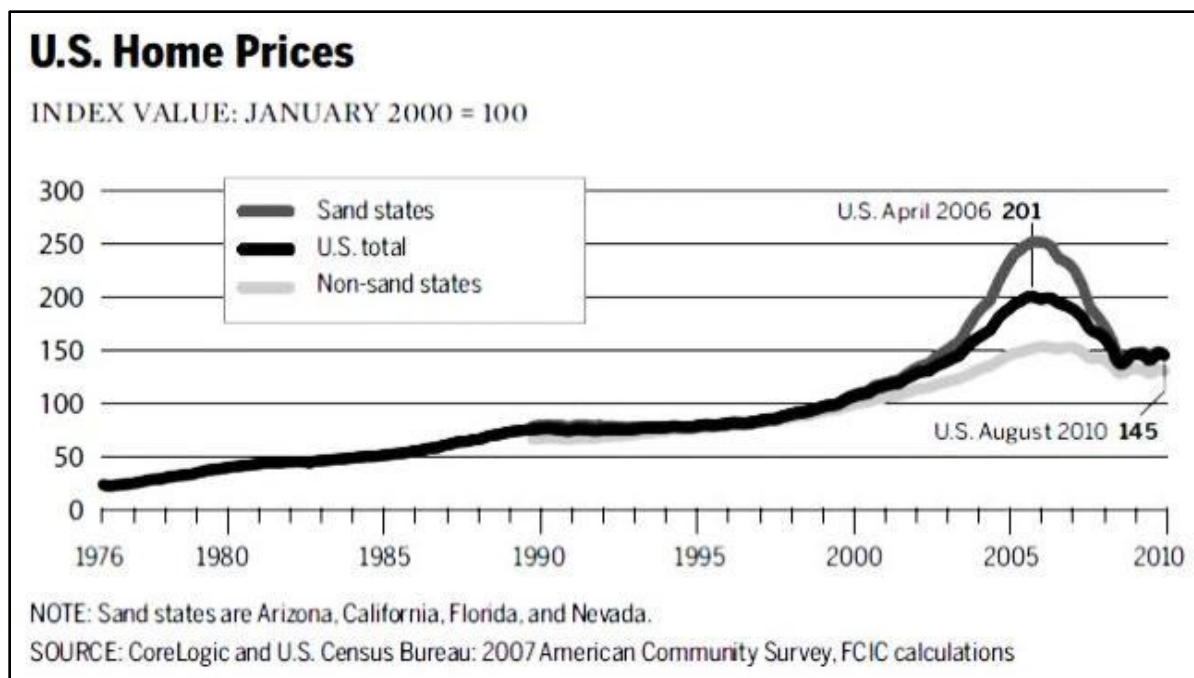


Figure 3: US Home Prices

Source: *Financial Crisis Inquiry Commission 2011; p. 87*

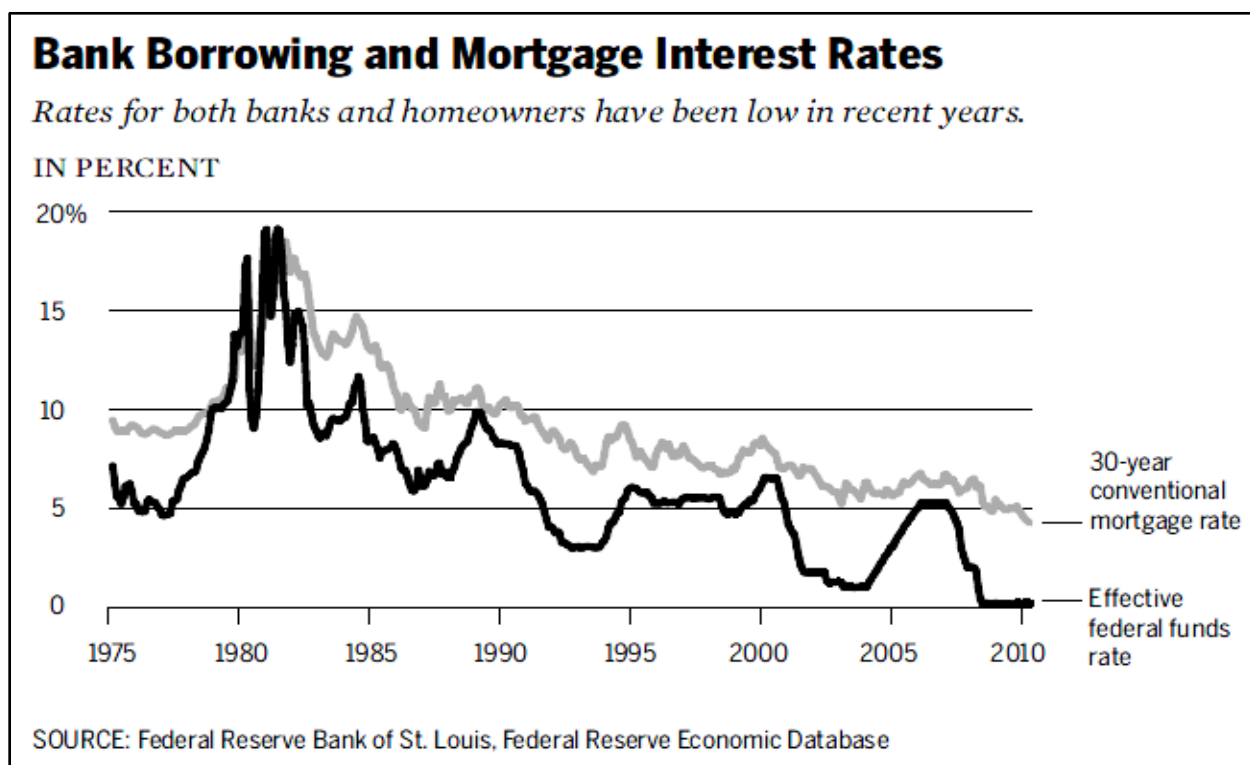


Figure 4: Bank Borrowing and Mortgage Interest Rates

Source: *FCIC 2011: 86*

Securitization itself and mortgage-backed securities (another form of derivative), along with the models of loan origination and distribution along the commodity chain, are fundamental proximate causes of the financial crisis because they helped to raise debt exponentially and perverted incentive structures so that short-term profits could be made by selling low quality long-term debt. Fannie Mae and Freddie Mac, given the ability to operate in securities markets with generous government subsidies, grew “their debt obligations and outstanding mortgage-backed securities... from \$759 billion in 1990 to \$1.4 trillion in 1995 and \$2.4 trillion in 2000” (FCIC 2011:40). Through the years, Fannie Mae, initially a government entity created to purchase and resell mortgages after the Great Depression, turned into a major player in the mortgage industry and subsequently the crisis. Fannie and its “brother” corporate entity Freddie Mac transformed along with the new financial architecture and were allowed to branch further and further into the new ways of finance, leveraging their debt to outstanding proportions.

In 1968 Fannie’s accumulated debt began to weigh on the government. To get this debt off the balance sheets Fannie was transformed into a publicly traded company, turning it into a hybrid government sponsored enterprise. Fannie and Freddie became key players in the housing market, but their dual missions to promote the US economy and US public through mortgage lending *and* maximize returns to shareholders were contradictory to say the least.

Around this time Fannie and Freddie were given the option of securitizing mortgages rather than holding on to them, which began the *originate and distribute* model that became so common over the last few years. This model provides incentives through every step of the commodity chain to resell debt, first due to the profits made by reselling the debt and secondly through removing that debt from companies’ balance sheets, making them seem more profitable. Accounting measures for understanding these types of debt and their resale are inadequate, especially when dealing with high leverage ratios and “off the books” accounting methods (FCIC 2011). Additionally, the *slice and dice* model allows for the repackaging and pooling of many forms of debt such as mortgages, auto loans, credit card debt, and others. In this model, debt of various types with various quality ratings can

be sliced and diced, or cut up and re-pooled into new forms. The new forms can then be resold to others.

These two models of financial processes working in tandem made for the spread of opaque, mispriced, and highly leveraged debt all across the world, leading many investors to have very little knowledge of where their debt actually came from. Opacity is one of the ways problems moved outside of the US mortgage industry to other investors who had no idea they had invested in subprime loans. This led to an exacerbation of market panic because liquidity dried up outside mortgage markets since no one knew who held bad debt.

Repackaged loans increase the difficulty in correctly pricing them, for a singular loan is far easier to understand than a heterogeneous mixture of different kinds of debt. In theory, repackaging allows investors to pick only the aspects of debt that they care to invest in (high vs. low risk, etc.), but in reality repackaging, especially through the ways it was done leading up to the crisis, increases the opacity of the security. Reselling the debt also makes the assets of companies more opaque through moving debts off balance sheets; this makes the value of a company much more difficult to understand since usual calculations do not account for them. The difficulties that people had in figuring out the actual value of banks and their debt obligations through certain stages of the crisis exemplifies this problem.

The originator of the loan and the investors who might benefit from the loan's repayment were separated by numerous links on the commodity chain through reselling – the *originate and distribute* model. In addition, at each link in the chain that debt could be *sliced and diced*, or repackaged into a new bundle, re-leveraged, and resold to the next investor. Under the new financial pay schemes that allowed actors to profit in the short term, the long-term consequences of the implementation of these models were either not foreseen or not cared about.

Individual compensation was closely linked to the overall performance of a private company in previous decades because private investment banks operated as partnerships. When banks became publicly traded entities this link broke down and changed the culture of the industry – bankers were now trading shareholders' money, not just their own. During the 1980s and 1990s many investment banks went public. Annual compensation

was increasingly given in stock options and became tied to annual earnings, which incentivized short-term payoffs, rather than long-term benefits to be paid at retirement, as in the older partnership system. This in turn incentivized greater risk-taking, greater leveraging, and even some number fudging (FCIC 2011). Moreover, according to Sheila Blair, FDIC Chairman, the compensation structure for the whole chain of mortgage securitization

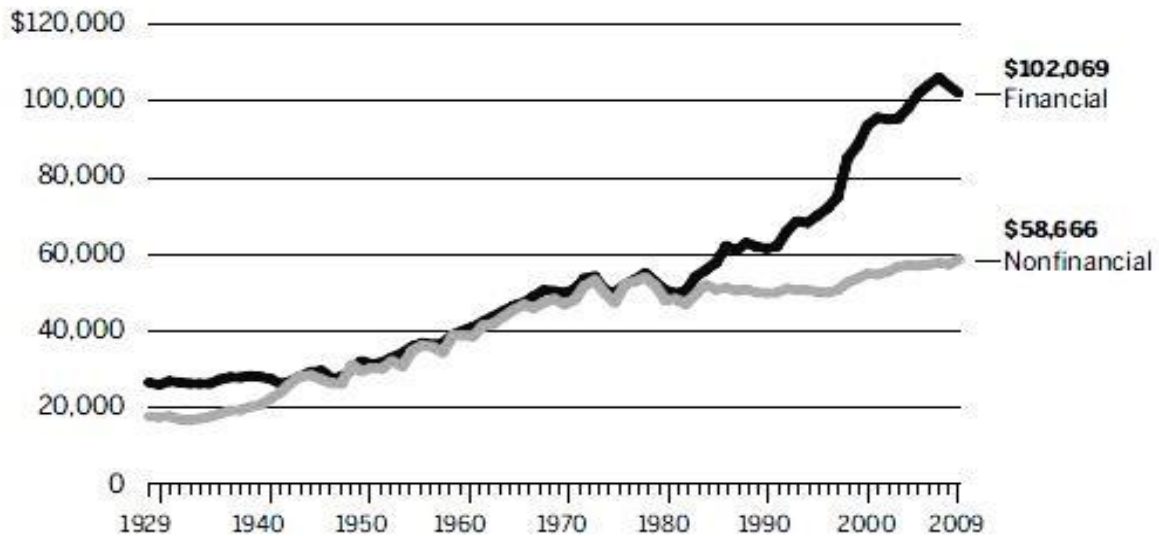
... was based on the volume of loans originated rather than the performance and quality of the loans made.... Many major financial institutions created asymmetric compensation packages that paid employees enormous sums for short-term success, even if these same decisions result in significant long-term losses or failure for investors and taxpayers. (Quoted in FCIC 2011:64)

New incentive structures, fewer regulatory constraints on both commercial and investment banks, and the increased ability to leverage through derivative markets drove profits up. As *Figure 5* shows below, financial pay outstripped non-financial pay for the first time since before the Great Depression, providing evidence for Arrighi's argument that a waning hegemon gains advantage in finance as they lose advantages in the production of material goods. At the same time, new risk management techniques and bank mergers were lauded as ways to mitigate the growing risks taken by the banks. These individual and structural changes, together with the role of the Fed and the rise of the over-the-counter (OTC) derivatives markets, helped to create a perfect storm for crisis.

Compensation in Financial and Nonfinancial Sectors

Compensation in the financial sector outstripped pay elsewhere, a pattern not seen since the years before the Great Depression.

ANNUAL AVERAGE, IN 2009 DOLLARS



NOTE: Average compensation includes wages, salaries, commissions, tips, bonuses, and payments for government insurance and pension programs. Nonfinancial sector is all domestic employees except those in finance and insurance.

SOURCES: Bureau of Economic Analysis, Bureau of Labor Statistics, CPI-Urban, FCIC calculations

Figure 5: Rising Compensation in the Financial Sector

Source: *Financial Crisis Inquiry Commission 2011; p. 62*

High leverage ratios in banks were also a substantial contributing factor to the crisis. High leverage ratios generate large profits during a boom time, but when faced with falling housing prices and growing defaults on loans, banks with high leverage ratios in mortgage debt take on larger losses (Goodhart 2008). These immense leverage ratios were fostered through a number of occurrences including the creation of the shadow banking system, deregulation of the financial industry, a changing mortgage industry, increased competition between banks fighting stagnation, and the creation of complex financial instruments such as securities, derivatives, and the like.

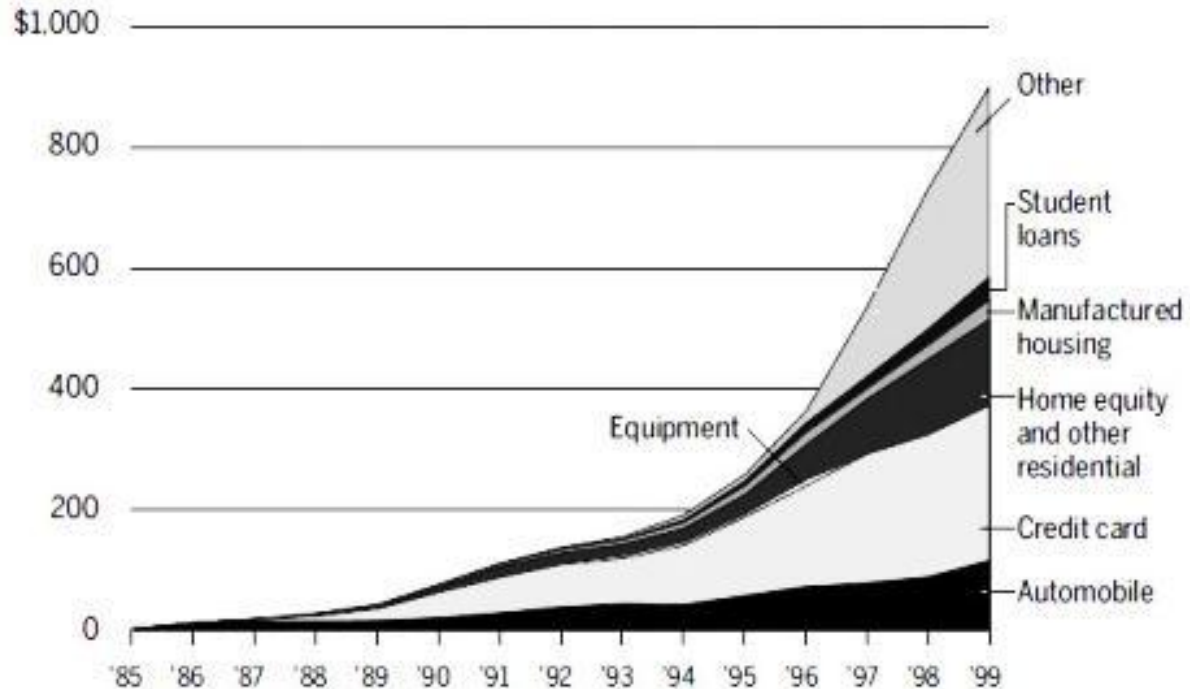
In the late 80s new rules allowed for greater leverage ratios in many banks and helped lead to the failure of large financial institutions. The Basel International Capital Accord, or “Basel I,” is an international regulatory regime that, among other things, sets international capital standards. In 1988, many of the world’s central banks and bank supervisors met to set out principles for capital requirements. One outcome of this meeting was the requirement that banks hold more capital against riskier assets. But, these new Basel rules “made capital requirements for mortgages and mortgage-backed securities looser than for all other assets related to corporate and consumer loans” (FCIC 2011:49). In fact, the capital holding requirements for banks’ holdings of such securities were less than all other assets except for those explicitly backed by the US government” (FCIC 2011:49). As we will soon see, leverage ratios in Fannie Mae and Freddie Mac were also highly problematic.

Government subsidies such as tax exemptions and large credit lines from the treasury gave Fannie and Freddie a competitive edge over other banks and the political support for home ownership granted them both much legitimacy. Capital requirements on the two companies were much lower than for regular banks and tacit support from the government made their investments seem quite safe. When stiffer regulations were placed on thrifts in the early 90s, it became more profitable for banks to securitize or sell their loans through Fannie and Freddie, leading to some astronomical leveraging statistics: in 2000 “Fannie and Freddie held or guaranteed more than \$2 trillion of mortgages, backed by only \$35.7 billion of shareholder equity” (FCIC 2011:42). The rise in asset-backed securities in the 90s can be seen in *Figure 6* below.

Asset-Backed Securities Outstanding

In the 1990s, many kinds of loans were packaged into asset-backed securities.

IN BILLIONS OF DOLLARS



NOTE: Residential loans do not include loans securitized by government-sponsored enterprises.

SOURCE: Securities Industry and Financial Markets Association

Figure 6: Asset-Backed Securities Outstanding

Source: Financial Crisis Inquiry Commission 2011; p. 45

This discussion of the role of Fannie and Freddie in the creation of the crisis shows the interplay between the government and the market, proving that they are not separated and have great effects on each other. It is now apparent that government actors pushed lending in the housing market to new heights by: changing laws for personal, political, or economic benefit; enacting policies that fostered large leverage ratios; utilizing problematic lending models; and inserting government entities into the economy. We should also note that these practices contradict the neoliberal ideology, even though many involved were active proponents of such an ideology, at least on the surface.

One of the most fundamental contradictions of the financial crisis was the mispricing of risk in the face of much highly regarded financial-economic theory that proposed to lower that risk. The anti-historical nature of orthodox economic theories pushed many to abstract away historical change and use in its place general theoretical perspectives on risk that applied only to an economy in a boom time or only dealt with individual rather than systemic risks. Rather than dealing with the empirical aspects of the economy, these theories were based mainly on the functioning of newly formed financial instruments. Contrary to these theories, the mispricing of risk in the economy was due to a number of historical factors including: a low risk spread, low interest rates, and pricing problems in OTC markets.

Risk spreads are the differences between riskier and safer assets and affect the price and profitability of those assets or debts. In the 2000s these spreads moved to historically low levels due in great part to the role of credit rating agencies. For example, many collateral mortgage obligations were rated AAA, suggesting that they were no more risky than government bonds, traditionally the least risky group of assets. Most importantly, credit rating agencies rate only the credit default risk of assets, not the market or liquidity risk. They can therefore be misleading or easily misinterpreted if one is not watching the macro-economy as a whole. Also, there is an obvious conflict of interest involved within the credit rating agencies, for they are paid by the originators of loans to rate the loans in question. Credit rating agencies became the evaluators of such investments and were paid lucrative fees by those in the securitization industry, further perverting incentives (FCIC 2011; Callinicos 2010).

Options, a form of commodity derivative, are usually traded in formal markets like the Chicago Mercantile Exchange, but financialized derivatives like swaps are increasingly traded in over-the-counter markets (FCIC 2011). These markets involve two parties contracting directly with each other, rather than in a formal standardized market. The upshot is that financial derivatives are not easy to regulate by nations, nor are they easy to account for on company balance sheets; accounting problems led to great difficulties in understanding who had investments where, for many investments were sliced up, repackaged and resold in the lead up to the crisis. Tracing loans to their originators was a difficult task and raised the panic level in worldwide markets, spreading the crisis past the borders of the US.

Moreover, pricing derivatives is quite difficult because understanding specific derivatives requires a thorough comprehension of numerous factors relating to global production and consumption that would be necessary to accurately price them. Just a few of these factors are supply, demand, interest rates, exchange rates, and most importantly, the risk associated with predicting such variables through time and space. Without an incredibly complex grip on highly contingent phenomena, it is very difficult to price derivatives correctly, especially under perverse incentive structures and a highly contingent global financial economy. Such issues show how a housing and liquidity crisis in the US crisis became the largest global financial crisis since the Great Depression.

The Fed's role in creating stability also contributed to the mispricing of risk. In the past, the Fed consistently stepped in to help avert disaster in the markets: "In 1970, the Fed had supported the commercial paper market; in 1980, dealers in silver futures; in 1982, the repo market; in 1987, the stock market after the Dow Jones Industrial Average fell by 26% in three days" (FCIC 201:57). Through cutting interest rates deeply to foster borrowing and calling emergency meetings with banks, the Fed created the perception that they would not allow systemic crises in the economy and fostered a false sense of safety for investors. We should recall that there is virtually no role for government entities prior to the onset of a crisis under the current system; government agencies must wait for crises to hit before acting. The Fed's role in the crisis is an example of the ironies involved in trying to mend an intrinsically broken system. The Federal Reserve and other government entities were given

powers to limit systemic risks after the Great Depression and even though many of those powers have since been removed, the few that are left actually contribute to crises by covering them up in the short run; these entities do not contribute to stopping crises; they only stave them off for a while.

The early 2000s were also a time of very low nominal and real interest rates which, on one hand, led to more borrowing in general due to its low cost. On the other hand, low interest rates and competition from large commodity-based companies moving into the financial sector led banks and investors to search for higher profits from other assets that were more risky and seemingly more profitable. After the bursting of the tech bubble in 2001, central banks pushed interest rates down in fear of price deflation and followed a Friedmanite expansionary monetarist policy. The global savings glut was also perceived to be a factor in the worldwide low interest rates (Bernanke 2005, cited in Goodhart 2008; Callinicos 2010; Davies 2010). Furthermore, macroeconomic stability of many core countries (not including Japan) in the 1990s led to low inflation with rather steady growth and the perception of less risk in the overall economy (Goodhart 2008).

When a company became “too big to fail,” or posed systemic risk to the economy as a whole, the Fed could *and would* step in to create macroeconomic stability, one of the few roles left to the state under the neoliberal ideology. It seems that capitalists realized this role of the Fed and exploited it ruthlessly through their actions leading up to the crisis and through the actions they took after state bailouts.

The FCIC states that:

The late 1990s was a good time for investment banking. Annual public underwritings and private placements of corporate securities in U.S. markets almost quadrupled, from \$600 billion in 1994 to \$2.2 trillion in 2001. Annual initial offerings of public stocks (IPOs) soared from \$28 billion in 1994 to \$76 billion in 2000 as banks and securities firms sponsored IPOs for new Internet and telecommunications companies – the dot-coms and telecoms. A stock market boom ensued comparable to the great bull market of the 1920s. The value of publicly traded stocks rose from \$5.8 trillion in December 1994 to \$17.8 trillion in March 2000. The boom was particularly striking in recent dot-com and telecom issues on the NASDAQ exchange. *Over this period, the NASDAQ skyrocketed from 752 to 5,048.* (2011:59; emphasis added)

In the spring of 2000 this bubble burst, causing the NASDAQ to fall almost two thirds in one year. Some successful hedging by firms that purchased credit-default swaps led many to believe that the new financial instruments were able to do their purported job by transmitting high risk to those who were willing to purchase it. The Fed also moved in to stave off a depression of the economy by slashing the federal funds rate (the overnight lending rate for transactions between banks) from 6.5 percent to 1 percent. In addition, “the Fed flooded the financial markets with money by purchasing more than \$150 billion in government securities and lending \$45 billion to banks,” while also suspending “restrictions on bank holding companies so the banks could make large loans to their securities affiliates” (FCIC 2011:60). The Fed attempted to funnel liquidity into the system. These kinds of actions are now commonly referred to as “The Greenspan Put.” The Greenspan put, in a nutshell, allows bubbles to grow and grow, with only a few shy warnings to actors. Then, when the bubbles pop monetary policy is pushed into full gear to mitigate as much pain as possible.

Thus, the role of the Federal Reserve in creating short-term macroeconomic stability has had the unintended consequence of creating a climate of perceived low financial risk. With less risk perceived in the economy, investors searching for higher rates of returns in highly competitive arenas tend toward more risky investments such as subprime mortgage lending. As Lawrence Lindsey, former National Economic Council director and former Federal Reserve governor told the FCIC, “We had convinced ourselves that we were in a less risky world.... And how should any rational investor respond to a less risky world? They should lay on more risk” (FCIC 2011:61).

From Black Monday in 1987 to the Asian financial crisis of 1997 to the LTCM collapse in 1998 to the tech bubble collapse in 2001, the Fed has consistently mitigated problems in the financial system. But monetary policy can only deal with these issues for a limited time before deeper problems stemming from stagnation in the productive economy surface. While the Fed’s actions were helpful in addressing the short-term problems of the economy, overall its efforts created an environment in which financial risk is perceived as less than it actually may be (Goodhart 2008; FCIC 2011). The role of the Fed and the US government in creating stability in the macroeconomic system, on the surface, seems

intelligent and benign. However, these actions have contradictory and unintended consequences: on one hand, the surface economy appeared less risky, though on the other hand, deep structural problems were covered up and investors moved toward very hazardous endeavors.

The risks in the financial system, it now becomes obvious, were certainly spread – they were spread globally through opaque financial calculus. But how did so many banks and investors make such horrible decisions? In part, it was due to a lacking understanding of how derivatives act in a time of panic and low liquidity – as markets panicked and the boom turned to bust, highly leveraged derivatives, rather than turning immense profits, led to immense losses, for leverage ratios work both ways (FCIC 2011). In addition, mortgage-backed securities are often traded in over-the-counter (OTC) markets and are contracts between two entities. With little to no regulation or insurance in these OTC markets investors must trust each other to pay out when necessary. Since mortgage-backed securities and the like can be used to transfer debt off company balance sheets, many companies may have seemed more trustworthy or solvent than they actually were. Moving debt off a balance sheet is a rather tantalizing action for many companies and, when mixed with the profitability of selling debt along the commodity chain, made for great difficulty in figuring out who owned what debt and how solvent each company actually was. The *slice and dice* model of selling mortgage-backed securities and credit-default swaps helped to make derivatives more opaque. After being repackaged and resold a number of times, it became very difficult to tell where the debt actually came from. Was it subprime or what? Due to inadequate accounting measures for complex financial instruments and debt obligations, many companies' balance sheets were rather difficult to understand contributing to the market scare and liquidity crisis.

Moreover, credit ratings agencies did not fulfill their task very well (Callinicos 2010; Davies 2010; FCIC 2011; Goodhart 2008; Stiglitz 2010). Derivatives were sliced and diced so much that these agencies gave triple-A ratings – the same ratings that the safest investments like government bonds get – to mountains of bad debt. So, many of the derivatives that became problematic during the crisis were horribly mispriced due to being “sliced and diced” and rated at much higher quality than they actually were.

Actors within the system that used ridiculous leverage ratios under perverse incentive schemes also made many derivatives defunct as tools of risk management. Leveraging can increase profits in boom times but increases losses just as much in a bust. In the long housing boom people seemed to assume that prices would never go down, so leverage ratios went up. The “originate and distribute” model was used often, for it allowed for short term profit making. Selling mortgage-backed securities all along the commodity chain was common. When profits for CEOs of investment banks are based on short-term gains that pay out every year, they will have already made their money by the time the bubble bursts. In cases such as that derivatives’ function of binding the future to the present no longer matter, for the incentives of those making the transaction are paid before any profits could be made from the actual repayment of the loans. With short term profit incentives for the sale or resale of mortgage debt (debt that takes a long time to repay), incentives become contradictory and the function of derivatives becomes defunct.

When the house of cards began to crumble “Who owns the risk?” became a salient and frightening question. The slice and dice model of securities and mortgage sales created much panic in the markets, for it was almost impossible to know who owned what debt and what quality the debt was, for it had been repackaged and resold along the commodity chain so many times. Due to lacking knowledge about debt in general, the failures of credit ratings agencies to accurately rate pieces of debt, and the inability of accounting measures to understand the real worth of companies that held their debt in complex financial instruments banks and investors were apprehensive to loan money to anyone that may not be able to pay it back. Under a stage of crash and panic that included virtually everyone. Furthermore, interest rates were incredibly low and left investors little incentive to loan money.

Since the 1960s most banks have been holding more assets in the private sector rather than holding obviously liquid assets like government debt. These private sector assets, prior to the crisis at least, had rather high credit ratings but were still not as easy to sell on open secondary markets like OTC markets. Residential mortgages are a prime example of these kinds of assets (Goodhart 2008). In boom times assets with increasing prices are quite liquid; it is easy to sell them in a secondary market. However, in times of

crisis these assets become much less liquid, making it much more difficult for banks and companies to move assets and go about their daily business. The increasing use of these assets has lowered banks' ability to deal with liquidity crises and have pushed them to rely more on the central bank for help.

We will now take a brief look at Long-Term Capital Management (LTCM), for it is a large US hedge fund that exemplifies the consequences of structural problems within the new financial architecture and how those problems can spread quickly. Furthermore, it is an example of how Fed actions taken to mitigate crises can have the unintended consequence of fostering false perceptions of low risk. LTCM is a precursor to the crisis and a microcosm of processes that happened on a more global scale through the financial crisis and it therefore makes for a good example of processes that led to the crisis.

When Russia defaulted on part of its national debt in 1998, the market became panicked and many investors sold their higher risk securities to move into safer investments like US treasury bills and federally insured deposits (FCIC 2011). Many corporations and states in the US use short-term paper markets to roll over short-term debt so they can pay their operating costs. When these markets become troubled, liquidity, the lubrication of the financial system, goes down and companies have trouble paying their everyday costs. They then turn to commercial banks for loans to prevent disruptions in the flow of goods and services.

LTCM utilized leveraging to borrow \$24 for every \$1 of investor equity – this led to returns of 19.9%, 42.8%, 10.8%, and 17.1% over the previous four years respectively – a handsome investment by almost any standards (FCIC 2011). However, leveraging works both ways and losses during a bust become magnified as much as profits in a boom time. In this bust LTCM lost \$4 billion (80% of its capital) and faced insolvency. A singular firm, even a large one, going bankrupt is not normally a threat to the system as a whole. But, LTCM “had further leveraged itself by entering into derivatives contracts with more than \$1 trillion in notional amount – mostly (through) interest rate and equity derivatives” (FCIC 2011:57). LTCM negotiated its contracts in the OTC markets, which we have seen to be unregulated and relatively opaque. Thus, with immense amounts of leveraging and little understanding of what banks may be affected by a run on LTCM, the already fragile money

market could fall and spill over to affect others not involved with LTCM. In essence, there was great fear of a run in the credit and derivatives markets, markets that are integral to the working of the economy as a whole.

The periodic crises in finance were continually averted – or, more truthfully, postponed – over the last years of the 20th century. The dot-com bubble and its transfer into the housing bubble over the beginning of the 21st century boosted the US economy and made it seem, at least on the surface, that growth was moving along at a decent pace. However, artificially rising housing prices and the creation of new forms of debt follow Foster and Magdoff's (2009) phases of a crisis: markets marched into "speculative manias," "novel offerings," and "credit expansions," which would go through a phase of "distress" (evidenced by rising interest rates and lowering housing prices in 2006) that soon ended in "crash and panic." As Bear Stearns's assets lost a huge portion of their value, faith in global markets was lost, due in great part to the fact that many banks all over the world had been speculating on hedge funds and in such an opaque system could not tell how toxic their assets actually were – a situation similar to that of the LTCM crisis, but on a global scale. Panic spread across the world, there was a run on US treasury bills (a traditionally "safe" place to hold money due to the hegemony of the dollar), and a drastic decrease in lending.

Though the financial crisis should be viewed as an ongoing process with specific watershed moments, it began in earnest with the collapse of Bear Stearns in July of 2007. One of those moments was the fall of Bear Stearns in the face of lowering housing prices and numerous mortgage defaults. The company's collapse was based on its risky dealings in mortgage-backed securities and subprime mortgages. As the housing market fell and delinquencies on subprime mortgages rose, there was a run on Bear Stearns' assets, for the company was exposed to risky mortgages, had high leverage ratios, and relied heavily on short-term funding (FCIC 2011). The compensation scheme for the CEOs of Bear Stearns was rather perverse, incentivizing short-term gain with minimal consequences for future losses within the company.

Throughout 2007 numerous mortgage delinquencies and defaults pushed ratings agencies to downgrade CDOs and mortgage-backed securities. As the demand for mortgage-backed securities dried up, Bear Stearns was left with highly illiquid debt that

could no longer be moved around. The plummeting prices of banks that were failing allowed for their buy up at “fire-sale” prices, creating larger conglomerations in the financial industry²⁰ (Foster and Magdoff 2009). There was, as in past times of economic uncertainty, a flight to quality and a fear of investing and loaning through the markets in crisis. The liquidity crisis of Bear Stearns frightened investors and that fear spread the liquidity crisis to global markets.

Davies (2010) describes the beginnings of the crisis itself succinctly:

In the early summer of 2007, the cost of insuring subprime mortgages began to rise sharply. The ratings agencies put subprime-related securitizations on ‘downgrade review.’ Some hedge funds run by Bear Stearns had difficulty meeting margin calls and Countrywide Financial announced a sharp drop in earnings. By July, the market for short-term asset-backed commercial paper, an important source of liquidity for the banks, began to dry up. IKB, a German bank active in the subprime market, was unable to roll over its paper in July and a rescue package was put together. On 9 August, BNP Paribas froze redemptions for three investment funds. On that day, the European Central Bank responded to the freezing up of the markets, and particularly the inter-bank market, by injecting almost €100 billion in overnight credit, and the US Federal Reserve followed suit quickly. By September, Northern Rock, which had financed its operations through a massive securitization programme, was unable to secure finance and had to go to the Bank of England for liquidity. (P. 51)

The further specifics of the crisis itself are outside the scope of this work. Instead of dealing with those specifics, we must focus our lens on the results of the crisis that signal other long-term transformations of capitalism. While the crisis itself is quite an occurrence, it is only a hiccup in the capitalist system as a whole. Though the crisis shocked many and continues to have consequences, it does not in itself signal a change in the workings of capital. If anything, the crisis will only teach capital to work in more dastardly and insidious ways. So, rather than looking at the minutiae of the crisis, we should now turn to understanding how a long-term transition in capitalism might affect the world in the

²⁰ The crisis itself and the ensuing low prices of banks and mergers show how the crisis is both a release of certain tensions that had been building prior to the crisis as well as an extension and compounding of other tensions. The tensions are released momentarily and brought to fruition by the panic that spread through the markets. It finally became obvious that there were great contradictions in the system, namely that the financial and productive sectors of the economy had fallen out of step with each other. However, at the same time, the realization of these problems led to a fall in the prices of banks and many of them were merged and bought up. So, one of the contradictions that led to the crisis - that banks became “too big to fail” - was actually exacerbated in the wake of the crisis through further merging of banks into larger and larger entities.

coming years. We must look at derivatives and their role in the system in general, not simply their role in the crisis.

Derivatives in Global Capitalism

Derivatives may continue to play a substantial role in the global financial system, for the globalization and financialization of the economy require a new form of supranational money to facilitate trade under transnationalized capital accumulation processes. As US hegemony wanes, there is a realistic possibility that the hegemony of the US dollar will wane as well (Cohen 2009; Calleo 2009; Kirshner 2009). It is also unclear as to whether another national currency will be able to play the role of hegemonic currency (Helleiner and Kirshner 2009).

Thus, it is necessary to question the future role of derivatives in the global financial system by further theorizing their use in history. Bryan and Rafferty, in their book *Capitalism with Derivatives* (2006), take an innovative and radical stance on the role of derivatives today and also argue that derivatives will play a large, if somewhat frightening role in the future of the global system. A reinterpretation of their work in terms of the financial crisis will make up the next section of the essay.

Derivatives signal a number of large-scale transformations in global capitalism, not only – as happened during the crisis – that debt and investments can be thoroughly obscured and profited upon within the financial system. The two large-scale issues that deeper theorization of derivatives brings to the fore are: (1) derivatives can act as an anchor to the global financial system in the absence of a supra-national form of money; and (2) derivatives change the ways we view ownership and the resulting views emphasize the tendency of capitalism toward intensified competition.

After the collapse of the Bretton Woods monetary system in the 1970s, in which nation-state money was all pegged to the US dollar which was in turn pegged to gold, exchange rates began floating and there was nothing to *explicitly* peg nation-state money to. The US dollar has been an implicit peg for many international transactions for decades, but the fate of the dollar as a hegemonic currency is quite contingent and could change

quickly (Helleiner and Kirshner 2009). Financial derivatives add a new fold to contemporary discussions of money and its role in the global economy.

To get past the usual, surface level understandings of money toward a view that integrates derivatives in a deep manner, we must briefly interrogate theories of value. Theories of value up and to this point have had great troubles finding a universal measure of value and though derivatives do not give this universal measure, they do reflect contingent values between commodities, leading to their ability to anchor to the global financial system (Bryan and Rafferty 2006).

Using the neoclassical version of theory gives a subjectified utilitarian view – you may be willing to pay a hundred thousand dollars for a car, but I am not, for expensive cars hold little utility for me. What if a car that was worth a hundred thousand dollars two years ago has sat in a lot for the duration? The car has lost value. A Marxist theory of value places the value on the labor power sold to produce the commodity and is based on the level of productive capacity and average skill within a society. But what if we move from one society to another? Do the values not change? The question remains: which theory of value is correct? Depending on the perspective, both are, or at least both can be. People still purchase things and economists of all stripes still make equations that assume a certain value. The world still turns, even though we have not found a universal way to understand or measure value (Bryan and Rafferty 2006).

What the conflict between these theories of value shows is that *value is contingent*. The current theories of value also show that it is difficult to add variations in time and space and still deal with value in an objective way. Discussions of price usually enter the picture quickly after value, for they are easier to deal with and give a much more objective feel, but nonetheless still do not get at a fundamental valuation of goods. Since years of economic theory and political economy have not led us to a singular definition of value, and value is still utilized in everyday transactions, there may be another way. In order to deal with the contingency and dynamism of value, we require a more dynamic way of valuing things, a way to sidestep value in some sense. This dynamism is found in derivatives because they include the contingency of values within themselves (Bryan and Rafferty

2006). By calculating investors' values and predictions of exchange rates, derivatives allow for the supersession of national money that is not anchored to gold.

Getting past nation-state money is one of the main functions of derivatives. To comprehend the current phase, we must first comprehend the changing nature and role of derivatives, for they not only give a new way to move capital around the world, but may qualitatively transform the form and logic of capital with dire repercussions for labor.

The US's role as forerunner in qualitatively transforming capitalism is still continuing. The financial crisis has shown yet another change in capitalism over the last few decades: the increasing use of derivatives as metacapital in a globalized world. Granted, the use of derivatives contributed much to the crisis itself, an obviously negative occurrence, but the explosion of derivative markets over the last three decades points to a change and contradiction in the global financial system. Nation-state money and nation-state regulation are viewed and treated as absolutely fundamental to capitalism, but in a global economy there is an urgent need for capital to hedge against exchange rate volatility and other types of risk through a supranational form of money – derivatives are that form.

A vast contradiction exists between thought and policies regarding the economy, for corporations function in a system that provides only nation-state money but now expects global competition and the mobility of goods along global production chains. Capitalists need global money, but there is no global guarantor of money. Instead capitalists choose to enter into derivative contracts with each other that, in situations with good information, allow them to calculate and hedge against risks like price hikes, exchange rate fluctuations, or changing government monetary policies. The discussion in chapter two of the need for an analytical shift in our views of the nation-state applies similarly to our views of nation-state money: under globalization national money becomes problematic due to the supranational nature of the economy and must be dealt with through theory, since it has already been dealt with in practice.

Derivatives help to anchor the global money system much like gold did in the 19th century because they supersede nation-state money through containing exchange rate volatility, or containing risk due to loan payment default. They give a universal measure that transcends states by their popularity in OTC markets and their ability to bind and

blend assets and money from all over the world. Thus, as commodity chains become more globalized, derivatives may come to play a more integral role for transnational capitalists that fight the tendency toward stagnation by searching for the cheapest inputs they can find. By facilitating transnational investments and the movement of capital across countries, derivatives increase pressures on local workers and manufacturers to become more and more competitive. In addition to these new capitalist faculties, derivatives also change how capital is owned and how profits are made from investments, for with derivatives an investor does not need to own rights to a piece of capital, or even to a corporation; they can speculate only on the performance of capital by betting on its future profitability. This allows for the temporary overcoming of capital's spatial fixes and gives capitalists yet another way to move their money more freely to find profits in more competitive arenas.

Much like the new form of ownership that the joint-stock company brought about centuries ago, derivatives in their financial forms change the way we view ownership in 21st century capitalism (Bryan and Rafferty 2006). Derivatives have affected a change in types of ownership of capital and thus become a form of *metacapital* because "the derivative owner does not have a right to ownership of capital as it is conventionally understood, but they do have ownership rights associated with the *attributes* of capital," which has effects on how we theorize ownership and how new forms of ownership increase competition in the system (Bryan and Rafferty 2006:68; emphasis added). New forms of ownership increase alienation under capitalism because they increase the distance between capitalist investors and the workers who create the material goods at the base of the economy.

Ownership under capitalist social relations can be broken down into three degrees of separation (Bryan and Rafferty 2006). Each of these degrees corresponds to an increase in alienation. The first degree of separation includes separating the worker from ownership of the means of production and can also be viewed as alienation of the first degree. Under this form of ownership, capitalists own the means of production and have control over them. Laborers are alienated from those means of production and participate in production only through wage labor. This form of ownership coincides with the transition from feudalism

to capitalism and the creation of the firm as the main entity conducting production. Laborers are no longer tied to or “owned” by the feudal lord and acquire the freedom of movement, but must now compete with each other for work.

“The second degree of separation of capitalist ownership involves the process in which company ownership is separated from production and capital competes as companies” and is historically represented by the joint-stock company (Bryan and Rafferty 2006: 72, emphasis removed). By purchasing a share in a joint-stock company, investors purchase rights to the profits of that company – they acquire equity in the company – but do not control production directly. That function is taken over, at least for the most part, by a managerial class. The two classes together, owner and manager, participate in the firm as capitalists, but as capitalists of different kinds. The two kinds of capitalists though have the same goal: profit. Now, juridically, the company becomes a legal “person” with the singular goal of acquiring profit; it becomes a new entity, alienated from labor, that exists and performs under its own logic, a logic indifferent to the needs of labor: the logic of profit accumulation.

The shift toward the joint-stock company increases competition in three ways: (1) by articulating a structural, alienated competitive logic; (2) by facilitating an increased scale of operations; and (3) by increasing flexibility (Bryan and Rafferty 2006). Regarding the first point, in the joint-stock company, owners have only a financial claim to the profits of the company, not to the capital that makes up the company itself. Owners become alienated from the actual production process and move to a second degree of alienation from the laborers performing those processes; they have no interaction with these laborers. Managers are alienated from both ownership of the means of production and from the laborers themselves. Workers continue to be alienated from the mode of production since the manager makes the decisions. But the laborer also becomes further alienated from capitalists themselves; the owners of the company have no direct relationship with the workers that make their profit. All of this creates a compounded, removed structure of alienation – the joint-stock company – whose only driving force is to increase profits.

The new ability for capitalists to invest in joint-stock companies with only their money increases the scale of operations as a whole because capital is able to be pooled

through investments. Moreover, owners need little or no knowledge of the actual production process and can thus pool their capital together toward ventures such as railway systems and other large-scale projects – projects that individual capitalists would have trouble acquiring enough assets for. Ownership of companies is then put on a secondary market: the stock market. This allows for ownership itself to become more mobile and liquid. The owner does not stake claims on the actual material of the company, but only on an abstract value of that company. Owners are not compelled to care for labor, only for profit and can drop their investments on a whim. Capital competes on the stock market as firms and ownership can be transferred quickly and easily, depending upon the expected rates of profit for those firms.

Under the third degree of the separation of capital from ownership – the degree that derivatives add – capital starts to compete as itself, for “capital ownership is separated from company ownership” (Bryan and Rafferty 2006:74). First, owning a derivative share in a company entails an investment in attributes of that company. An investor may purchase a derivative that profits from speculation on the price of a company share in the future or from speculation on the profitability of a company. The derivative owner does not own a stake in the company itself, only a stake on the performance of that company. An investor may also purchase another kind of derivative, say a mortgage-backed security. This security is a claim on the *performance* of a mortgage loan or pool of mortgage loans, not a claim on the profit from the loan itself. For example, an investor may purchase a derivative that would pay out if a specific set of loans were *not* repaid. The investor thus speculates on the attributes of capital: the likelihood that a mortgage or set of mortgages will be repaid. “A derivative therefore gives its owner exposure to a selected range of different underlying asset values within the one, combined, form of capital, but... *it can provide this selected exposure because it is separated from ownership of the underlying assets themselves*” (Bryan and Rafferty 2006: 74-5; emphasis in original). Now, the capitalist has little reason to care for the company as a whole; if the company is expected to be unprofitable, the financial capitalist can simply bet against the well-being of the company. Those with the money are now separated from labor by yet another degree. They could continue to be indifferent to labor, or, they could even bet against labor. The financial

capitalist is not fixed in space and can easily move investments across the world with the click of a button. The increased mobility of investment and lacking concrete ties have great effects on competition in the system as a whole.

Competition under the third degree of separation is different from the second. Under the second degree, firms or corporations compete with each other in the stock market by attempting to maximize profit for a company as a whole entity. Under the third degree, capital competes as assets and

Competition... pertains to the relative valuation of different assets and liabilities between and across asset forms, time and space, irrespective of their ownership. The logic of competition is not of firms or corporations maximizing profit, but of assets, everywhere, being continually commensurated with each other on the basis of their profit-making potential. Derivatives, therefore, represent a form of capital that is inherently competitive, because they embody an intense market-driven relative valuation of different assets. (Bryan and Rafferty 2006: 76-7)

The logic of competition is different here than in the second separation: firms and corporations do not only compete regarding profitability in the stock market; the disaggregated capital of firms is broken down into its attributes, which then compete against each other in financial markets. Thus, the calculations of financial market participants push company owners and managers to fret about more than their end product or the profitability of their company – capitalists must also make their individualized assets competitive. Labor must also become more competitive under this schema by agreeing to lower wages and increased productivity at each step in the commodity chain.

The joint-stock company removed investors from owning and managing physical capital itself, and gave them the ability to own a financial stake in a company. Derivatives allow investors to move away from investing in companies as whole entities toward investing only in the attributes of disaggregated capital that they deem profitable. These investors no longer care so much about the profitability of the company itself, but instead focus on the profitability of its disaggregated assets. Instead of companies competing against each other in the stock market, their assets now compete against each other in

financial markets. This increases competition, for capitalists must focus on and constantly revalue numerous different sectors within their production processes.

Most importantly, the repercussions for labor could be dire. Increased competition in the system as a whole is usually dealt with, at least in part, by putting more downward pressure on wages and more upward pressure on productivity. But how much pressure can labor take?

Conclusion

The preceding pages have outlined a far-reaching look into the long-term transformations that helped create the financial crisis. The perspective put forth here elucidates the ways that systemic cycles of accumulation, world hegemony, neoliberalism, globalization, and financialization have all come together as analytically separable but mutually reinforcing lines of history that promoted and led into the financial crisis. This research is, of course, far from exhaustive. The crisis is far too complex and nuanced to be fully elaborated within the span of a single project. Thus, there is much left to be done. The main goal of this work, though, was to put the crisis into a theoretically robust macrohistorical context, with the intent that future researchers could overcome some of the problems that stem from more orthodox, myopic views on the subject. I hope I have succeeded in this goal.

To conclude, I would like to elaborate some themes germane to the project as whole: the role and necessity of dynamic dialectical theorizing and the effects that spatiotemporal scope and quality have on analyses of capitalism and creative destruction.

Enlightenment Logic vs. Negative Dialectical Logic

To start, a simple, Enlightenment-era logic would lead one to believe that a crisis would beget reactions that actually remedy the ensuing problems. Instead of taking a simplistic, Enlightenment perspective on the crisis, we must view the crisis through a thoroughly dialectical lens. To be more specific, we must view the crisis through a dynamic,

dialectical lens that has the ability to move through numerous frames of reference and holds contradictions in tension instead of trying to explain them away.

An Enlightenment logic will not quite do for this task, but a dialectical perspective that draws on Adorno's (1990) negative dialectic will. Simple enlightenment logic will not suffice, for this linear form of logic focuses on the resolution of tensions as opposed to their deepening. While Enlightenment logic would posit a mounting contradiction, a moment of crisis, and a subsequent synthesis or understanding that releases tensions, to understand the financial crisis requires a negative-dialectical logic that places the continuation and deepening of tensions at the fore while still comprehending any synthetic elements. In a negative-dialectical logic, tensions may be momentarily released on the surface through crisis or the weak reactions to it, but in the wake old tensions become more strained and new ones become apparent.

The orthodox economic perspectives of today follow Enlightenment logics and include mixtures of classical, neoclassical, Keynesian, monetarist, and neoliberal perspectives, all of which have flaws that keep them from a cogent view of the crisis. Such perspectives look only at surface problems and therefore give only surface answers. The use of these perspectives in policy practice tends to reinforce the problems that are supposed to be fixed. Consequences from the bailouts are now starting to hit home in the US. Congress's inability to come to a timely decision on raising the debt ceiling – an action they have undertaken many times over the years – pushed S&P to downgrade the credit score of the US for the first time in history. At the time of this writing, markets are still shaky.

Moreover, even though neoliberal policies contributed to the crisis, many governments are now attempting to use what they see as ameliorative neoliberal policy to fix problems stemming from those policies. In the US, these changes will probably come in the form of cuts to entitlement programs by the so-called "Super Congress." According to Glen and McAuliff (2011), "if the new legislative body, made up of six Democrats and six Republicans from both chambers, doesn't come up with a bill that cuts at least \$1.5 trillion by Thanksgiving, entitlement programs will automatically be slashed."

In Europe, the financial crisis has helped to create a periphery within the usual core of Western European countries. The EU's attempt at creating an integrated regional economy that uses a supranational currency, the euro, is creating new problems that threaten to send the global market into further recession. Germany, Luxembourg, Netherlands, and France, the core countries in the EU, implemented export-led development policies since the adoption of the euro, while the PIIGS (Portugal, Italy, Ireland, Greece, and Spain) adopted debt-financing to import goods from the core countries, leading to a dire imbalance in the regional and global economy. The PIIGS now face austerity measures to keep themselves solvent and keep the Euro viable. Greece in particular is now faulted for its "socialist" system (Panageotou 2011; Perez-Caldentey and Vernengo 2011) and austerity measures are being proposed reminiscent of the IMF-led structural adjustment programs thrust upon Latin American countries and others throughout the last few decades (Robinson 2010).

One of the greatest contradictory consequences of the financial crisis and the failure of the economics profession is the re-establishment and reinforcement of neoliberal state values and practices that squeeze labor and whatever is left of the welfare state. Austerity measures for the PIGS and the US are most certainly on the table. And, at least in the US, tax hikes are not.

To add another contradictory fold, the crisis has affected a reinforcement of right-wing, anti-state, or neoliberal values in at least a portion of the US public. It was fairly obvious in the 2008 US presidential election that many were tired of Bush-era strategies and it was time for a "change." The real turning point in the election came from the Obama campaign's ability to give quick answers to the problems of the financial crisis while McCain's campaign sputtered. Obama won the election based on his change campaign, but by inheriting a mountain of debt from the Bush administration wars on terror and a global financial crisis, positive change became hard to come by.

As the government continued to pile on more debt with more bailouts, a vocal group of tea partiers chided the use of US taxpayers' money to support the financiers who so directly contributed to the crisis. The loss of Democratic majority in congress further stifled the Democrats' ability to react to the crisis. Moreover, the healthcare changes that Obama

pushed through have had few perceivable effects on the population as a whole. The effects that are addressed tend to come only from critics. The Obama administration was unable to quickly fix the financial crisis – a crisis brought on by neoliberal ideology and practice – and a decidedly right-wing ideology came to the surface, due in part to the weak Keynesian policies that increased government debt and showed little sign of pushing the economy toward recovery. It appears that austerity measures will soon be implemented in the US through a further reduction of the already barely-existent welfare state; social security, Medicare, Medicaid, unemployment benefits and the like may soon change. Labor, already squeezed for decades, may soon face more austerity.

In essence, policymakers' orthodox reactions to the crisis are analogous to putting a band aid on a gaping wound. Without radical changes in the way the economy is managed – and the ways individuals view the role of the economy – crises will continue to be a recurrent part of social life. The failures of the economics discipline to provide workable answers to the crisis, taken along with most policymakers' inability to create and implement innovative policy, have created an environment in which it seems very little can be done.

Some have acknowledged the issues that plague the discipline of economics: according to some critical economists, “the deeper roots of this failure (are due) to the profession's insistence on constructing models that, by design, disregard the key elements driving outcomes in real-world markets” (Colander et al. 2009:1). Suffice it to say that what depth economics has comes from an intense focus on minutiae that promotes a disciplinary disdain for history and a love of mathematical models. Contemporary economics deals in highly abstracted models that do not reflect the interconnectedness of history, politics, and economic reality.

A different kind of perspective is necessary to understand the crisis, a perspective that embraces the history of the economy-society relationship and delineates qualitative changes in that relationship. I will now delineate this dynamic, dialectical theory in terms of creative destruction, crisis, and the history of capitalism.

Creative Destruction

Using dynamic theory requires that qualitative and temporal scope be made explicit, especially when dealing with broad concepts like crisis, creative destruction, and capitalism. Elements that are relatively transhistorical from one frame of analysis may become historically specific when that scope is changed. Schumpeter and his concept of creative destruction are prime examples, for Schumpeter's "main emphasis was on the need to grasp how economic reality is entwined with social reality, as a *dynamic process* whose appreciation facilitates an understanding of how economy, society, culture, and politics influence each other, are reciprocally constituted, and change over time" (Dahms 2011:449, emphasis in original). Creative destruction, in a general sense, refers to the creation of new forms that destroy the old and we can see this process at play on various temporal and analytical levels throughout history. By applying this concept through different frames of reference, we can gain, not only a better understanding of the past, but a tentative look into the future.

Limiting analysis to the inception of capitalism, creative destruction refers to the creation of capitalism and the destruction of feudal social relations. Moving on to a frame surveying only the evolution of capitalist history, which treats capitalism as transhistorical, it seems that crises have been thoroughly integrated into the overarching logic of capitalism. Within this frame of reference, capitalism, taken as a whole, integrates crises – especially financial crises – into its *modus operandi* through certain forms of creative destruction, supplying capitalism as a systemic logic with great dynamism, adaptability, and an uncanny ability for crisis-management that serves to promote the further intensification of capitalist social relations and accumulation by dispossession in the wake of crises.

Additionally, by expanding our scope to include pre-capitalist history, capitalist history, and the possibility of a post-capitalist future, we find that capitalism may hold within itself the germ of its own demise; creative destruction in yet another sense of the term. Capitalism has not always been the fundamental guiding logic of society and another form may someday come to the fore as the primary determinant of social relations. While capitalism has matured and deepened over the centuries by drawing on forms of creative

destruction that allow it to continue growing on a level above that which is destroyed, the driving force that is creative destruction may soon turn on to capitalism itself, destroying the latter and creating something qualitatively different in its wake.

We can delineate five different types of creative destruction by shifting frames of reference. All but one of these types are integral parts of capitalism's *modus operandi* that initiate, extend, and intensify its existence, turning it into a highly dynamic structuring logic. Being explicit about frames of reference helps to distinguish between the inception of capitalism and creative destruction, types of creative destruction that act through capitalism, and the possibility that an evolved form of creative destruction could turn inward onto capitalism itself and open the way for new forms of social relations. I will now elaborate these points in more detail.

The Creation of Capitalism and the Destruction of Feudalism: Creative Destruction as Primitive Accumulation

Capitalism overtook the last system-wide organizational schema through the destruction of feudal social relations, commonly referred to as *primitive accumulation* (Marx 1978; Schumpeter 1962). Primitive accumulation is the initial form of creative destruction and is the driver for the inception of capitalism.

The primitive accumulation process continued over the last few centuries, spreading competitive markets geographically through a second kind of creative destruction: *extensive accumulation by dispossession*. Centuries ago, as entrepreneurial merchants created new practices for gaining wealth, the seeds of a creative, destructive, and fundamentally expansive form of social relations leached life from the old ways and spread across the earth. An increasingly rational and abstract process sprouted in the economic sector of protean city-states, edging out and transforming irrevocably those institutions and systems preceding it.²¹ As the creation of new values and their corresponding practices intensified, monarchies began their long march toward destruction.

²¹ See Karl Polanyi (2001) Chapter 7 for a description of the institution of market capitalism in England in the 18th and 19 centuries.

Over the years, social relations became increasingly based on the rationalization of economic production – to use Polanyi's (2001) terms, society was embedded in the market. "Rational" actors used their newfound efficiencies to thrust competition on others, forcing either adherence to the new modes of accumulation or annihilation in their wake. In the process, laborers moved from under the heels of fiefdoms into the arena of markets.

Feudalism gave way to the modern nation-state, kings and queens became politicians, the words liberty and democracy grew from ideas into partial realities, and as the Enlightenment swept over the West, science displaced religion as the primary law of the land. From old myths sprang new ideas, ideas that promised wondrous advances, ideas that promised the liberation of all humankind and the mastery of nature.

But, just as the feudal, atavistic world gave way to rationality, rationality, touting its unerring universalism, turned inward, perverting its own ideals in the name of itself. As Horkheimer and Adorno put it: "Just as myths already entail enlightenment, with every step enlightenment entangles itself more deeply in mythology" (2002:8). The rationality of the economic sphere bled into the rationalization of organizations, and the push for individualism and democracy subtly transformed into a tendency toward totalitarianism (Schumpeter 1962). However, this new totalitarianism promotes itself in the name freedom and democracy; it promotes itself in the name of science.

The third form of creative destruction, termed *intensive accumulation by dispossession*, is made up of the destruction of non-capitalist processes that exist in already primarily capitalist spaces and the creation of more profitable (or exploitative) processes to take their place. These new processes serve to further embed society in the competitive market. As we saw earlier, capitalism has run up against extensive limits, and, relying on growth for its survival, has now begun to grow more intensively through the financialization of consumption, distribution, and production processes.

Creative Destruction as Essential to Capitalism: Dynamism and Increasing Tensions

Speaking from a frame of reference focused only on the history of capitalism that excludes future possibilities, the effects of the financial crisis, rather than indicating an end to capitalism, actually exemplify and reinforce many of the tensions that created the crisis

itself; put differently, the effects of the financial crisis deepen many of its temporally prior causes. Crises are relatively non-problematic because capitalism has integrated many kinds of crises into its schema through different forms of creative destruction. These simultaneously creative and destructive modes are integral parts of capitalism that initiate, extend, and intensify its existence, making evolutionary change a defining feature of capitalism itself. Schumpeter, the progenitor of the concept of creative destruction tells us:

The essential point to grasp is that in dealing with capitalism we are dealing with an evolutionary process.... Capitalism, then, is by nature a form or method of economic change and not only never is but never can be stationary.... The fundamental impulse that sets and keeps the capitalist engine in motion comes from the new consumers' goods, the new methods of production or transportation, the new markets, the new forms of industrial organization that capitalist enterprise creates.... The opening up of new markets, foreign or domestic, and the organizational development... illustrate the same process of industrial mutation... that incessantly revolutionizes the economic structure *from within*, incessantly destroying the old one, incessantly creating a new one. This process of Creative Destruction is the essential fact about capitalism. ([1942] 1962: 82-3, emphasis in original)

Schumpeter's statements bring to the fore the need to distinguish one's scope of analysis. Discussing creative destruction as an "essential fact" of capitalism implicitly treats capitalism as relatively transhistorical; one is led to believe that capitalism as a system is inexorable, unstoppable, and universal. From a limited temporal reference frame, this seems to be the case; the crisis itself and its consequences exemplify creative destruction and the deepening of tensions.

A fourth kind of creative destruction makes crises an integral part of capitalism. This more purely economic conception of creative destruction refers to the devaluation of existing capital that allows for further growth. This conception is exemplified by (1) the "destruction" of previously powerful companies like Sears & Roebuck and their replacement by corporations like Wal-Mart; (2) the replacement of VHS tapes by DVDs and other technological advances that are mostly unnecessary for the reproduction of society; (3) the destruction and rebuilding of capital through war-making, exemplified by the great gains of the US after World War II; and, most pertinent for the present study, (4) the destruction or devaluation of capital in the aftermath of financial crises. As Marx (1858)

stated in *The Grundrisse*, capital is destroyed, “not by relations external to it, but rather as a condition of its self-preservation.”²² This condition of self-preservation is creative destruction. Thus, crises are not necessarily problematic for capitalism; from this frame of reference, they are essential to it.

For example, banks not crushed by the crisis were able to quickly buy up those that were. Subprime homeowners, on the other hand, were left with houses worth far less than what they paid for them, forcing many to wake up from the American Dream of home ownership. In great contrast, financial capitalists – at least those who bet against the repayment of subprime mortgages or otherwise managed to avoid catastrophe – were presented with a housing market characterized by the lowest prices and interest rates seen in years. Giving a slight spin to Andrew Mellon’s infamous statement, David Harvey (2010) hits the nail (or the proletariat) right on the head by reminding us that “in a crisis, assets return to their rightful owners” (p. 11). These “rightful owners,” of course, are the bourgeoisie. To make matters worse for the general public, the Bush administration quickly pushed through a rescue package that funneled taxpayers’ current and future money into the financial system. By giving banks a boost to their books, economists and policymakers thought they could forestall the coming liquidity crisis and keep the US economy on track.

The immense size of banks led to the crisis and in the aftermath numerous banks merged into even larger entities; financial capitalists helped cause the crisis, but many were also its beneficiaries; neoliberal policies and ideologies contributed to the crisis, and neoliberal austerity policies are now put forth as remedies for it. Capitalism’s ability to deal with and even be strengthened by crises is part of what makes it so adaptable.²³ This adaptability, however, may not be eternal. As capitalism reaches limits to growth, creative destruction, the essential engine of that growth, may turn on its longtime benefactor.

The Possibility of the Creative Destruction of Capitalism

By taking a wider frame of reference and applying the idea of creative destruction to capitalism, rather than treating creative destruction as something consisting only *within*

²² See <http://www.marxists.org/archive/marx/works/1857/grundrisse/ch15.htm> for the specific quote.

²³ See Harvey 2010, Appendix 1 for a list of debt crises over the last forty years. Debt crises promote capitalism, they do not destroy it.

capitalism or as a part of it, we see that capitalism may hold its end in itself. Looking at creative destruction in this different light leads to a fifth typology: the destruction of capitalism and the creation of something qualitatively different in its place.²⁴ Elaborating this form of creative destruction is outside the scope of this work. However, imagining that “another world is possible” is a first step in creating a post-capitalist society.

Though many thought that the crisis would be only a single dip recession, it seems now that we may be in the midst of a transition from short-lived recession into ongoing depression. Global overaccumulation problems and the extensive limits of social, economic, and natural environments leave little room for the kind of expansion that our current socioeconomic system is so fundamentally based on. Put bluntly, the worst may be yet to come.

The outlook for the future may not be so dismal though. As I wrote much of this work, general US sentiments about the crisis appeared to be either apathetic or shifting further toward right-wing authoritarianism. As stated earlier, the financial crisis, rather than promoting a legitimacy crisis in neoliberal ideology, seemed to reinforce the same ideologies that promoted the crisis in the first place. Calls for less government intervention in markets, more focus on personal responsibility, and the retreat of whatever may be left of the welfare state were trumpeted by the most prominent movement in the initial wake of the crisis: the Tea Party.

Now however, new social movements such as Occupy Wall Street and others around the globe offer some hope for imagining another world. While these movements are currently in their formative stages, they indicate a will within the people to take more control over the economy. The global financial crisis proves that in the 21st century people all over the world are inextricably tied to one another. As the awareness of this fact grows, so does our ability to take control of the processes that dictate social reality.

Furthering such awareness is the goal of this study. While the analysis is far from complete, I have shown that the financial crisis is not simply due to recent occurrences like

²⁴Note that it is somewhat problematic to talk about capitalism as a monolithic “thing” that can be overcome. The process described is not a singular revolutionary moment in which capitalism will be quickly overthrown. Instead, it is best to view this form of creative destruction as an ongoing process working on different levels across space and time. This process would not completely destroy capitalist social relations, but would transform many of those core elements.

the housing boom or speculation and greed. It is instead a consequence of many strands in the evolution of the capitalist world system. These strands are both contradictory and complimentary. They move through decades and centuries, peoples and nations. They move through the history of the entire world.

The question remains: can we take control of history or will history take control of us?

*Nature, nurture, heaven and home
Sum of all and by them driven
To conquer every mountain shown
But I've never crossed the river*

*Braved the forest braved the stone
Braved the icy winds and fire
Braved and beat them on my own
Yet I'm helpless by the river*

*Angel, angel what have I done?
I've faced the quakes, the wind, the fire
I've conquered country, crown, and throne
Why can't I cross this river?*

*Pay no mind to the battles you've won
It'll take a lot more than rage and muscle
Open your heart and hands my son
Or you'll never make it over the river*

*It'll take a lot more than words and guns
A whole lot more than riches and muscle
The hands of the many must join as one
And together we'll cross the river*

Maynard James Keenan²⁵

²⁵ Puscifer 2011

References

- Achustan, Lakshman, and Anirvan Banerji. 2010. "No Double-Dip Recession." *CNNMoney*. Retrieved August 26, 2011 (http://money.cnn.com/2010/10/28/news/economy/no_double_dip/index.htm).
- Adorno, Theodor W. 2008. *Lectures on Negative Dialectics: Fragments of a Lecture Course 1965/1966*. 1st ed. Polity.
- , 1990. *Negative Dialectics*. 1st ed. Routledge.
- Albritton, Robert. 2007. *Economics Transformed: Discovering the Brilliance of Marx*. Pluto Press.
- , 2009. *Let Them Eat Junk: How Capitalism Creates Hunger and Obesity*. 1st ed. Pluto Press.
- Arrighi, Giovanni. 2009. *Adam Smith in Beijing: Lineages of the 21st Century*. Verso.
- , 2010. *The Long Twentieth Century: Money, Power and the Origins of Our Times*. New and Updated Edition. Verso.
- Arrighi, Giovanni and Beverly Silver. 1999. *Chaos and Governance in the Modern World System*. 1st ed. Univ Of Minnesota Press.
- Arrighi, Giovanni, and L. Zhang. 2011. "Beyond the Washington Consensus: A New Bandung." in *Globalization and Beyond: New Examinations of Global Power and Its Alternatives*, edited by María Patricia Fernández-Kelly and Jon Shefner. Penn State University Press.
- Baran, Paul A., and Paul M. Sweezy. 1968. *Monopoly Capital*. New York Univ Pr.
- Benton, Ted, and Ian Craib. 2010. *Philosophy of Social Science: The Philosophical Foundations of Social Thought*. 2nd ed. Palgrave Macmillan.
- Bernanke, Ben. 2005. "The Global Saving Glut and the U.S. Current Account Deficit." *The Federal Reserve Board*. Retrieved September 10, 2011

(<http://www.federalreserve.gov/boarddocs/speeches/2005/200503102/default.htm>).

Bluestone, Barry, and Bennett Harrison. 1984. *The Deindustrialization of America*. 1st ed. Basic Books.

Brenner, Robert. 2006. *The Economics of Global Turbulence: The Advanced Capitalist Economies from Long Boom to Long Downturn, 1945-2005*. London: Verso.

Breslau, Daniel. 2005. "The Real and the Imaginary in Economic Methodology." in *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others*, edited by George Steinmetz. Durham: Duke University Press.

Bryan, Dick, and Michael Rafferty. 2006. *Capitalism with Derivatives: A Political Economy of Financial Derivatives, Capital and Class*. Palgrave Macmillan.

Bryan, Dick, Randy Martin, and Michael Rafferty. 2009. "Financialization and Marx: Giving Labor and Capital a Financial Makeover." *Review of Radical Political Economics* 41(4):458.

Calleo, David P. 2009. "Twenty-First Century Geopolitics and the Erosion of the Dollar Order." in *The Future of the Dollar*, edited by Eric Helleiner and Jonathan Kirshner. Ithaca: Cornell University Press.

Callinicos, Alex. 2010. *Bonfire of Illusions: The Twin Crises of the Liberal World*. Polity.

Camic, Charles, and Yu Xie. 1994. "The Statistical Turn in American Social Science: Columbia University, 1890 to 1915." *American Sociological Review* 59(5):773-805.

Campello, M., J. R. Graham, and C. R. Harvey. 2010. "The Real Effects of Financial Constraints: Evidence from a Financial Crisis." *Journal of Financial Economics* 97(3):470-487.

Chari, V. V., L. Christiano, and P. J. Kehoe. 2008. "Facts and Myths About the Financial Crisis of 2008." *Federal Reserve Bank of Minneapolis Working Paper* 666.

- Chor, D., and K. Manova. 2011. "Off the Cliff and Back? Credit Conditions and International Trade During the Global Financial Crisis." *Journal of International Economics*.
- Chorev, Nitsan. 2010. "On the Origins of Neoliberalism: Political Shifts and Analytical Challenges." *Handbook of Politics* 127–144.
- Cohen, Benjamin J. 2009. "Toward a Leaderless Currency System." in *The Future of the Dollar*, edited by Eric Helleiner and Jonathan Kirshner. Ithaca: Cornell University Press.
- Colander, D. C., and U. Kiel. 2009. *The Financial Crisis and Systemic Failure of Academic Economics*. Institute for the World Economy. Retrieved January 2, 2010 (http://www.ifw-members.ifw-kiel.de/publications/the-financial-crisis-and-the-systemic-failure-of-academic-economics/KWP_1489_ColanderetalFinancial%20Crisis.pdf)
- Colander, David, Goldberg, Michael, Haas, Armin, Juselius, Katarina, Kirman, Alan, Lux, Thomas and Sloth, Brigitte. 2009. "The Financial Crisis and the Systemic Failure of the Economics Profession." *Critical Review* 21 (2): 249 — 267.
- Colás, Alejandro. 2005. "Neoliberalism, Globalisation and International Relations." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.
- Crotty, James. 2009. "Structural Causes of the Global Financial Crisis: A Critical Assessment of the 'New Financial Architecture'." *Cambridge Journal of Economics* 33(4):563 - 580. Retrieved May 13, 2011.
- Crow, Dan, and Greg Albo. 2005. "Neo-liberalism, NAFTA, and the State of the North American Labor Movements." *Just Labour* 6 & 7:12–22.

- Dahms, Harry. 2011. "Joseph A. Schumpeter." Pp. 559-581 in *The Wiley-Blackwell Companion to Major Social Theorists*, vol. 1, edited by George Ritzer & Jeff Stepnisky. Wiley-Blackwell.
- Davidoff, S. M, and D. Zaring. 2009. "Regulation by Deal: The Government's Response to the Financial Crisis." *Admin. Law Review* 61:463-535.
- Davies, Howard. 2010. *The Financial Crisis*. Malden, MA: Polity Press.
- Domhoff, G. William. 2009. *Who Rules America? Challenges to Corporate and Class Dominance*. 6th ed. McGraw-Hill Humanities/Social Sciences/Languages.
- Duménil, Gérard, and Dominique Lévy. 2004. *Capital Resurgent: Roots of the Neoliberal Revolution*. Cambridge, MA: Harvard University Press.
- , 2005. "The Neoliberal (Counter-)Revolution." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.
- , 2009. "The Crisis of Neoliberalism and US Hegemony." *Kuswechsel* 2:6-13.
- Eatwell, John, Murray Milgate, and Peter Newman. 1990. *Marxian Economics*. W. W. Norton & Company.
- Fernandez-Kelly, Patricia, and Jon Shefner, eds. 2006. *Out of the Shadows: Political Action and the Informal Economy in Latin America*. Pennsylvania State University Press (Trd).
- Financial Crisis Inquiry Commission. 2011. *The Financial Crisis Inquiry Report: The Final Report of the National Commission on the Causes of the Financial and Economic Crisis in the United States*. www.bnpublishing.net.
- Fligstein, Neil. 1993. *The Transformation of Corporate Control*. Harvard University Press.
- , 1996. "Markets as Politics: A Political-Cultural Approach to Market Institutions." *American Sociological Review* 61:656-673.

- , 1997. "Social Skill and Institutional Theory." *American Behavioral Scientist* 40(4):397.
- , 2001. *The Architecture of Markets: An Economic Sociology of Twenty-First-Century Capitalist Societies*. Princeton University Press.
- , 2008a. *Euroclash: The EU, European Identity, and the Future of Europe*. Oxford University Press, USA.
- , 2008b. "Theory and Methods for the Study of Strategic Action Fields." Pp. 16–19 in Institutional Development and Change Conference. Chicago, IL. Retrieved August 16, 2010 (<http://sociology.berkeley.edu/profiles/fligstein/pdf/Theory%20and%20Methods%20for%20the%20Study%20of%20SAFs.pdf>).
- , 2010. "Politics, the Reorganization of the Economy, and Income Inequality, 1980—2009." *Politics & Society* 38(2):233.
- Fligstein, Neil, and Luke Dauter. 2007. "The Sociology of Markets." *Annual Review of Sociology* 33:105–128.
- Fligstein, Neil, and Adam Goldstein. 2010. "The Anatomy of the Mortgage Securitization Crisis." Pp. 29–70 in *Markets on Trial: The Economic Sociology of the U.S. Financial Crisis*, vol. 30. Emerald Group Publishing Limited.
- Fligstein, Neil, and Iona Mara-Drita. 1996. "How to Make a Market: Reflections on the Attempt to Create a Single Market in the European Union." *American Journal of Sociology* 1–33.
- Foster, John Bellamy. 1986. *Theory of Monopoly Capitalism*. Monthly Review Press.
- Foster, John Bellamy, and Fred Magdoff. 2009. *The Great Financial Crisis: Causes and Consequences*. Monthly Review Press.

- Friedman, Milton. 1993. *Why Government Is the Problem*. Photocopy. Hoover Inst Pr.
- . 2002. *Capitalism and Freedom: Fortieth Anniversary Edition*. 1st ed. University Of Chicago Press.
- . 2008. *Milton Friedman on Economics: Selected Papers*. University of Chicago Press Journals.
- Friedman, Milton, and Anna Jacobson Schwartz. 1971. *A Monetary History of the United States, 1867-1960*. Princeton University Press.
- Friedman, Milton, and Anna Jacobson Schwartz. 2008. *The Great Contraction, 1929-1933: (New Edition)*. Princeton University Press.
- Fukuyama, Francis. 2006. *The End of History and the Last Man*. Free Press.
- Gabler, Neal. 2011. "The Elusive Big Idea." *New York Times*. Retrieved September 3, 2011 (http://www.nytimes.com/2011/08/14/opinion/sunday/the-elusive-big-idea.html?_r=2&scp=1&sq=big+idea&st=cse).
- Geithner, Timothy. 2010. "No 'Double-Dip' Recession." *UPI.com*. Retrieved August 26, 2011 (http://www.upi.com/Top_News/US/2010/07/25/Geithner-No-double-dip-recession/UPI-25771280085533/).
- George, Susan. 1999. "A Short History of Neoliberalism." *Transnational Institute*. Retrieved July 4, 2011 (<http://www.tni.org/article/short-history-neoliberalism>).
- Gerth, H.H. 2007. *From Max Weber: Essays in Sociology*. 1st ed. Routledge.
- Giddens, Anthony. 1987. *The Nation-State and Violence: Volume 2 of A Contemporary Critique of Historical Materialism*. University of California Press.

- Gieryn, T. F. 1983. "Boundary-Work and the Demarcation of Science from Non-Science: Strains and Interests in Professional Ideologies of Scientists." *American Sociological Review* 48(6):781–795.
- Goodhart, C. A.E. 2008. "The Background to the 2007 Financial Crisis." *International Economics and Economic Policy* 4(4):331–346.
- Gramsci, Antonio. 1972. *Selections from the Prison Notebooks of Antonio Gramsci*. International Publishers.
- Grim, Ryan, and Michael McAuliff. 2011. "Super Congress Getting Even More Super Powers In Debt Deal." Retrieved September 3, 2011 (http://www.huffingtonpost.com/2011/07/31/super-congress-debt-ceiling-deficit-deal_n_914272.html).
- Harrison, Bennett. 1997. *Lean and Mean: The Changing Landscape of Corporate Power in the Age of Flexibility*. Guilford Press.
- Harvey, David. 1991. *The Condition of Postmodernity: An Enquiry into the Origins of Cultural Change*. Wiley-Blackwell.
- , 2000. *Spaces of Hope*. 1st ed. University of California Press.
- , 2006. "Spaces of Global Capitalism: A Theory of Uneven Geographical Development."
- , 2007a. *A Brief History of Neoliberalism*. Oxford University Press, USA.
- , 2007b. "Neoliberalism as Creative Destruction." *The Annals of the American Academy of Political and Social Science* 610(1):21 -44. Retrieved July 4, 2011.
- , 2007c. *The Limits to Capital*. Updated. Verso.
- , 2009. "The 'New' Imperialism: Accumulation by Dispossession." *Socialist Register* 40(40).

- , 2010. *The Enigma of Capital: And the Crises of Capitalism*. 2nd ed. Oxford University Press, USA.
- Hayek, F. A. 1991. *The Fatal Conceit: The Errors of Socialism*. University Of Chicago Press.
- , 1996. *Individualism and Economic Order*. University Of Chicago Press.
- , 2011. *The Constitution of Liberty: The Definitive Edition*. University Of Chicago Press.
- , 2007. *The Road to Serfdom: Text and Documents--The Definitive Edition*. University Of Chicago Press.
- Helleiner, Eric, and Jonathan Kirshner, eds. 2009a. *The Future of the Dollar*. Ithaca: Cornell University Press.
- , 2009b. "The Future of the Dollar: Whither the Key Currency?" in *The Future of the Dollar*, edited by Eric Helleiner and Jonathan Kirshner. Ithaca: Cornell University Press.
- Hellwig, M. F. 2009. "Systemic Risk in the Financial Sector: An Analysis of the Subprime-Mortgage Financial Crisis." *De Economist* 157(2):129–207.
- Hennessy, Ray. 2010. "Bernanke: No Double-Dip Recession." *FOXbusiness.com*. Retrieved August 26, 2011 (<http://www.foxbusiness.com/story/markets/business-leaders/bernanke-double-dip-recession/>).
- Horkheimer, Max. 1975. *Critical Theory: Selected Essays*. 1st ed. Continuum Publishing Corporation.
- Horkheimer, Max, and Theodor W. Adorno. 2007. *Dialectic of Enlightenment*. 1st ed. Stanford University Press.

- Ivashina, V., and D. Scharfstein. 2010. "Bank Lending During the Financial Crisis of 2008." *Journal of Financial Economics* 97(3):319–338.
- Jaspers, Karl. 1995. *Great Philosophers Volume 4: Descartes, Pascal, Lessing, Kierkegaard, Nietzsche, Marx, Weber, Einstein*. 1st ed. Houghton Mifflin Harcourt.
- , 1996. *Reason and Existenz: Five Lectures*. Marquette University Press.
- , 2011. *Origin and Goal of History*. Routledge.
- Jessop, B. 2002. "Liberalism, Neoliberalism, and Urban Governance: A State-Theoretical Perspective." *Spaces of Neoliberalism: Urban Restructuring in North America and Western Europe* 105–125.
- Jing, Fu. 2011. "Economists Warn of Double-Dip." *chinadaily.com.cn*. Retrieved August 26, 2011 (http://www.chinadaily.com.cn/cndy/2011-08/26/content_13194792.htm).
- Juniper, James. 2009. "A Modern Money View of the Global Financial Crisis." Retrieved June 16, 2011 (<http://www.pol.mq.edu.au/apsa/papers/Refereed%20papers/Juniper%20-%20A%20Modern%20Money%20View%20of%20the%20Global%20Financial%20Crisis.pdf>).
- Keynes, John Maynard. 2011a. *The End of Laissez-Faire: The Economic Consequences of the Peace*. CreateSpace.
- , 2011b. *The General Theory of Employment Interest and Money*. Martino Fine Books.
- Kirshner, Jonathan. 2009. "After the (Relative) Fall: Dollar Diminution and the Consequences for American Power." in *The Future of the Dollar*, edited by Eric Helleiner and Jonathan Kirshner. Ithaca: Cornell University Press.
- Kuhn, Thomas S. 1996. *The Structure of Scientific Revolutions*. 3rd ed. University Of Chicago Press.

- Lahart, Justin. 2011. "Prospect of a Double-Dip Recession - WSJ.com." Retrieved August 26, 2011 (<http://online.wsj.com/article/SB10001424052702304665904576381331264252972.html>).
- Lapavitsas, Costas. 2005. "Mainstream Economics in the Neoliberal Era." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.
- Laux, C., and C. Leuz. 2009. *Did fair-value accounting contribute to the financial crisis?* National Bureau of Economic Research Cambridge, Mass., USA.
- Lawder, David. 2010. "IMF sees no double-dip U.S. recession: IMF's Kramer | Reuters." Retrieved August 26, 2011 (<http://www.reuters.com/article/2010/07/08/us-imf-kramer-idUSTRE6673EJ20100708>).
- Lawson, Tony. 2005. "A Perspective on Modern Economics." in *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others*, edited by George Steinmetz. Durham: Duke University Press.
- Li, Minqi. 2009. *The Rise of China and the Demise of the Capitalist World Economy*. Monthly Review Press.
- Locke, John. 1979. *An Essay Concerning Human Understanding*. Oxford University Press, USA.
- , 1997. *Locke: Political Essays*. Cambridge University Press.
- , 1993. *Two Treatises of Government*. Everyman Paperbacks.
- Locke, John, and Paul Sigmund. 2005. *The Selected Political Writings of John Locke*. W. W. Norton & Company.
- MacGregor, Susanne. 2005. "The Welfare State and Neoliberalism." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.

- Marx, Karl. 1858. "Economic Manuscripts: Grundrisse." Retrieved September 3, 2011
(<http://www.marxists.org/archive/marx/works/1857/grundrisse/ch15.htm>)
- , 1993. *Capital: A Critique of Political Economy, Vol. 3*. Penguin Classics.
- , 2009. *Capital: A Critique of Political Economy, V. 2*. University of Michigan Library.
- , 2010. *Capital: A Critique of Political Economy, Vol. 1*. CreateSpace.
- Marx, Karl, and Friedrich Engels. 1978. *The Marx-Engels Reader*. 2nd ed. W. W. Norton & Company.
- McCarthy, James, and Scott Prudham. 2004. "Neoliberal Nature and the Nature of Neoliberalism." *Geoforum* 35(3):275-283. Retrieved July 4, 2011.
- McIntyre, Douglas. 2011. "10 Signs the Double-Dip Recession has Begun." *msnbc.com*. Retrieved August 26, 2011
(http://www.msnbc.msn.com/id/43946055/ns/business-us_business/t/signs-double-dip-recession-has-begun/).
- Mills, C. Wright. 2000. *The Power Elite*. Oxford University Press, USA.
- Minsky, Hyman. 1982. *Can "It" Happen Again?: Essays on Instability and Finance*. M.E. Sharpe.
- , 2008a. *John Maynard Keynes*. 1st ed. McGraw-Hill.
- , 2008b. *Stabilizing an Unstable Economy*. 1st ed. McGraw-Hill.
- Mirowski, Philip. 2005. "How Positivism Made a Pact with the Postwar Social Sciences in the United States." in *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others*, edited by George Steinmetz. Durham: Duke University Press.
- Mises, Ludwig von. 2009. *The Theory of Money and Credit*. Ludwig von Mises Institute.

-----, 2010a. *Human Action: A Treatise on Economics*. Liberty Fund Inc.

-----, 2010b. *Liberalism*. Ludwig von Mises Institute.

Mitchell, Timothy. 2005. "Economists and the Economy in the Twentieth Century." in *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others, Politics, history, and culture*, edited by George Steinmetz. Durham: Duke University Press.

Munck, Ronaldo. 2005. "Neoliberalism and Politics, and the Politics of Neoliberalism." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.

Næss, Petter, and Karl Georg Høyer. 2009. "The Emperor's Green Clothes: Growth, Decoupling, and Capitalism." *Capitalism Nature Socialism* 20:74-95. Retrieved September 10, 2011.

National Intelligence Council. 2010. "Global Trends 2025: A Transformed World."

Nietzsche, Friedrich. 2000. *Basic Writings of Nietzsche*. Modern Library.

-----, 2011a. *Beyond Good and Evil*. Simon & Brown.

-----, 2011b. *Thus Spoke Zarathustra*. Simon & Brown.

Norris, Floyd. 2011. "Time to Say It - Double Dip May Be Happening." *NYTimes.com*. Retrieved August 26, 2011 (<http://www.nytimes.com/2011/08/05/business/economy/double-dip-recession-may-be-returning.html>).

Obstfeld, M., and K. Rogoff. 2009. "Global Imbalances and the Financial Crisis: Products of Common Causes", Federal Reserve Bank of San Francisco Asia Economic policy Conference."

- Ollman, Bertell. 2003. *Dance of the Dialectic: Steps in Marx's Method*. University of Illinois Press.
- Ott, Brian L., and Robert L. Mack. 2009. *Critical Media Studies: An Introduction*. 1st ed. Wiley-Blackwell.
- Palley, Thomas I. 2005. "From Keynesianism to Neoliberalism: Shifting Paradigms." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.
- Panageotou, Steve. 2011. "The Greek Financial Crisis." Presented at the 61st annual meeting of the Society for the Study of Social Problems, August 20, Las Vegas,. NV.
- Perez-Caldentey, Esteban, and Matias Vernengo. 2011. "The Euro Imbalances and Financial Deregulation: A Post Keynesian Interpretation of the European Debt Crisis." Presented at the Crisis in the Eurozone conference. November 3, Austin, TX. Retrieved September 4, 2011 ([http://www.utexas.edu/lbj/sites/default/files/file/news/Mati%CC%81as%20Vernengo%20Europaper%20\(2\)%5B1%5D.pdf](http://www.utexas.edu/lbj/sites/default/files/file/news/Mati%CC%81as%20Vernengo%20Europaper%20(2)%5B1%5D.pdf)).
- Puscifer. 2009. "*C*" *Is for (Please Insert Sophomoric Genitalia Reference Here) E.P.* Puscifer Entertainment.
- Rand, Ayn. 1963. *For the New Intellectual: The Philosophy of Ayn Rand (50th Anniversary Edition)*. Signet.
- , 1964. *The Virtue of Selfishness*. Signet.
- Rand, Ayn, Nathaniel Branden, Alan Greenspan, and Robert Hessen. 1986. *Capitalism: The Unknown Ideal*. 1967th ed. Signet.
- Ratcliff, D. E. 2002. "Analytic Induction as a Qualitative Research Method of Analysis." Retrieved October 9.

- Reinhart, C. M, and K. S Rogoff. 2009. *The Aftermath of Financial Crises*. Cambridge, Mass., USA: National Bureau of Economic Research.
- Robinson, William I. 2004. *A Theory of Global Capitalism: Production, Class, and State in a Transnational World*. The Johns Hopkins University Press.
- , 2010. *Latin America and Global Capitalism: A Critical Globalization Perspective*. 1st ed. The Johns Hopkins University Press.
- Rowland, Aaron Thomas. 2009. *From Authoritarian Dirty War to Neoliberal, "Democratic" Class War: Neoliberalism as Class Struggle in Argentina*. Thesis (M.A.)--University of Tennessee, Knoxville, 2009.
- Saad-Filho, Alfredo. 2005. "From Washington to Post-Washington Consensus: Neoliberal Agenda for Economic Development." in *Neoliberalism: A Critical Reader*, edited by Alfredo Saad-Filho and Deborah Johnston. Pluto Press.
- Saad-Filho, Alfredo, and Deborah Johnston, eds. 2005. *Neoliberalism: A Critical Reader*. Pluto Press.
- Schumpeter, Joseph A. 1962. *Capitalism, Socialism, and Democracy*. 3rd ed. Harper Perennial.
- Shefner, Jon, and Patricia Fernández-Kelly, eds. 2011. *Globalization and Beyond: New Examinations of Global Power and Its Alternatives*. Pennsylvania State University Press.
- Shin, H. S. 2009. "Reflections on Northern Rock: The Bank Run That Heralded the Global Financial Crisis." *Journal of Economic Perspectives* 23(1):101–119.
- Smith, Adam. 2010. *The Theory of Moral Sentiments*. Penguin Classics.
- , 2009. *The Wealth of Nations : Books 1-3 : Complete And Unabridged*. CreateSpace.

- Soederberg, Susanne. 2009. *Corporate Power and Ownership in Contemporary Capitalism: The Politics of Resistance and Domination*. 1st ed. Routledge.
- Somers, Margaret R. 2005. "Beware Trojan Horses Bearing Social Capital: How Privatization Turned Solidarity into a Bowling Team." in *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others*, edited by George Steinmetz. Durham: Duke University Press.
- Sopel, Jon. 2011. "Greece Crisis: MPs Approve Drastic Austerity Measures." *BBC News*. Retrieved September 3, 2011 (<http://www.bbc.co.uk/news/world-europe-13960947>).
- Stanley, Anne. 2011. "Get Ready for a Double-Dip Recession." *Personal Finance Daily*. Retrieved August 26, 2011 (http://www.marketwatch.com/story/get-ready-for-a-double-dip-recession-2011-08-24?link=MW_latest_news).
- Steinmetz, George, ed. 2005. *The Politics of Method in the Human Sciences: Positivism and Its Epistemological Others*. Durham, NC: Duke University Press.
- Stiglitz, Joseph E. 2010. "The Financial Crisis of 2007-8 and Its Macroeconomic Consequences." *Time for a Visible Hand* 1:19-50.
- Sweezy, Paul. 1942. *The Theory of Capitalist Development: Principles of Marxian Political Economy*. 1st ed. Monthly Review Press.
- Taylor, J. B. 2009. *The Financial Crisis and the Policy Responses: An Empirical Analysis of What Went Wrong*. National Bureau of Economic Research. Cambridge, Mass., USA.
- Thorsen, D. E, and A. Lie. 2000. "What is Neoliberalism?" *Department of Political Science. Norway: University of Oslo*.
- Wang, H., and T. Hutters. 2003. *China's New Order: Society, Politics, and Economy in Transition*. Harvard Univ Pr.

Weber, Max. 1978. *Economy and Society: An Outline of Interpretive Sociology*. University of California Press.

-----, 2002. *The Protestant Ethic and the Spirit of Capitalism: and Other Writings*. Penguin Classics.

-----, 2003. *The Essential Weber: A Reader*. Routledge.

Znaniecki, F. 1934. *The Method of Sociology*. New York: Farrar and Rinehart.

Appendix: Theoretical and Philosophical Underpinnings

Here, I will briefly lay out the theoretical and philosophical underpinnings that inform the study as a whole. The discipline of sociology in general does not normally deal with issues of the philosophy of social science explicitly, unless that is the specific goal of the project in question. However, I contend that such background formulations should be explicitly formulated in sociological research, for they help to give legitimacy to social science perspectives that attempt to move beyond more traditional, positivistic research.

Dynamic critical theory informed by dialectical critical realism gives the best perspective on the financial crisis. Put briefly, critical theory justifies immanent critique, political economy over orthodox economics, and a dialectical conception of reality which leads to dialectical theorizations. Critical realism justifies the use of social science practices that differ from those of the so-called natural sciences and leads to multicausal interpretations of the crisis. Furthermore, rather than predicting occurrences through ironclad laws, critical realism uses the idea of tendencies to show why certain changes may occur. Dynamic theory includes utilizing abstraction as a fundamental category to move explicitly through levels of generality, temporal scope, and geographical scope. All of these positions mutually reinforce one another and create a cohesive framework that drives the study.

First, a distinction should be made between traditional theory and critical social theory. Traditional theory can be traced back to Descartes' maxims stating that we should begin with the simplest objects, and through deduction, arrive at more complex formulations of how the world works (Horkheimer [1937] 1975). In traditional theory objects and their relationships are defined and put into a coherent, cohesive system of thought in which contradictions are synthesized and empirical facts are relegated to their respective places. The general scientific method and the practices of positivism are examples of traditional theorizing.²⁶

²⁶ It should be noted that the social sciences grew up in a world in which the natural sciences and Enlightenment values acted as constantly hovering parents (Mirowski 2005). Boundary work had to be done to delineate science from non-science and one discipline from another (Gieryn 1983). These boundaries will be dealt with more fully later, for feminist theory and the Frankfurt School have a great deal to say about such happenings.

Traditional theory does not normally recognize its socio-historical context. It acts as if in a vacuum and assumes that empirical “facts” speak for themselves. Traditional theory does not act as if it is a product of social institutions and norms, though the actual practice of science has been shown to be so (Camic and Xie 1994; Kuhn 1978²⁷; Mirowski 2005; Steinmetz 2005; Mitchell 2005; Benton and Craib 2010). Critical theory, on the other hand, takes its socio-historical situation as a fundamental aspect of its existence (Horkheimer [1937] 1975; Marx [1845] [1859] [1861] 1978; [1867] 2010). This fact is made explicit and utilized, not as a hindrance to objectivity, but as an effective measure for getting at what is actually happening in social research and society at large. Taking sociohistorical context as a possibly limiting factor leads me to look past more recent data and search for the longer term causes of the crisis.

Dynamic critical theory, as the name states, is a perspective that relies on immanent critique. The idea of immanent critique is a necessary part of critical theory, especially in its Marxist and Frankfurt School versions. The constantly changing social milieu that theory and science take place in necessitates immanent critique²⁸ (Marx 1978; 2010). If society is always changing, then the tools we use for understanding society must change as well. History moves inexorably forward and is reinterpreted through current lenses and new contexts call for new ways of conceptualizing the world.²⁹ To put it bluntly, a critical theorist’s work is never done. This type of theorizing is against a “first philosophy,” or a unified, universal conception of ontology and epistemology like the Enlightenment thinkers from Descartes onward.³⁰ It is also against using theory and science as purely instrumental knowledge that is utilized for mere prediction or the mastery of nature and people. Thus, critical theory as I conceptualize it is always in motion; it is, in a word, dynamic.

²⁷ Thomas Kuhn’s *The Structure of Scientific Revolutions* ([1962] 1978) was helpful in disseminating some of these ideas to a broader audience, however, he does not give a systematic and cohesive way of further understanding the actual practice of scientific research. This is something that has been remedied by a more explicit sociology of science, such as Camic and Xie’s work on the institutional and social factors that fed into the heavy use of statistics in American sociology (1994).

²⁸ One way to conceptualize immanent critique and dynamic theory is to note its parallel with the general existentialist dictum that things are always becoming and never simply being. See Jaspers [1957] 1995; [1935] 1996; [1949] 2011; Nietzsche 2000; [1886] 2011a; [1885] 2011b; and others.

²⁹ This most certainly holds true for social sciences, though it is arguable that the natural sciences require a critical version of theory as well.

³⁰ Later we will see that the commonsense Cartesian style of dualistic thinking can be a great hindrance to social research.

Dynamic critical theory also relies on the dynamic nature of modern society as a fundamental theoretical category. In other words, it takes the changing nature of social relations as a fundamental category of analysis. The old adage that “the only constant is change” is something that few would disagree with. Theorizing must try to mold itself in the fashion of what it is trying to understand. History (or social reality) is an ongoing and dynamic process, thus theory must also be so. However, the dynamism in question here takes this statement on a slightly different but imperative path: to use a mathematical metaphor, we must note that it is not only the variables within the equations that change; the equations, or the relationships between things, change themselves. This position leads me to explicitly change focus throughout the study, which brings in new concepts or layers of history and then add the new perspectives into the analysis as a whole, creating an additive framework that becomes more and more fleshed out along the way.

The Frankfurt School style of critical theory bases itself fundamentally on the works of Hegel and Marx and, utilizing the ideas outlined above regarding the differences between philosophy and theory, moves from philosophy toward social theory as the preeminent way of understanding and changing modern society. The idea of the dialectic is also a fundamental aspect of Frankfurt School critical theory, for contradictions become quite apparent through a brief look at modern society. There are numerous contradictions: between fact and norms within society, between how we understand reality and how reality plays out, between the goals and workings of the state, economy, and society, and many more. These contradictions should be a fundamental category through which we view the world. One point should be made about the dialectic as I conceive it: traditional theory attempts to explain away and remove contradictions by making things fully cohesive and rational, but critical theory tends to accentuate the inherent contradictions, holding them up in tension, and using them as heuristics for further understanding (Adorno [1965-1966] 1990; [1966] 2008; Marx 1978; Horkheimer and Adorno [1947] 2007). Here, I mean to get across that contradictions exist and, rather than explaining them away through over-rationalized, oversimplified theory, we should take the world as it is and work from there. I do not mean that we should *never* try to remove such contradictions

– that is part of the goal of emancipatory social research – but in a world fraught with great contradictions, we should conduct our research with the acknowledgment that they exist.

The focus on social relations is a fundamental characteristic of the Marxian method (Ollman 2003; Albritton 2007; Benton and Craib 2010). As one variable changes its relationships to other things change as well. Thus, dynamic critical theory relies in great part on a philosophy of science that Bertell Ollman (2003) calls *internal relations philosophy*. Internal relations philosophy states that a singular thing cannot be defined without defining its relationships to other things. Its definition rests on its surrounding relationships and as those relationships change, the thing itself changes as well. For example, could you really define yourself without giving a definition of your parents and your relationship to them? Could you define yourself without talking about the place you grew up, the school you went to, or the friends you have? Our relationships to other people and things make up the definitions of ourselves. The same goes for social, economic, and political reality. They must be defined through their relationships with other things existing at one point in time, as well as through their relationship to the past and future. The financial crisis cannot be defined without understanding its historical context, its relationships with business, politics, markets, and actors, relationships between nations, NGOs, international financial institutions (IFIs), or its relation to the lives of everyday people. This philosophy of science leads me to focus closely on the long-term historical nature of the financial crisis and the relationships between national laws and policies, organizational structures, market actors, and ideologies.

With an internal relations philosophy it seems that we must interrogate every aspect of social reality to truly understand the financial crisis. That is both true and impossible. So, instead of attempting to understand every shred of existence, dynamic critical theory, along with its explicit basis on the dialectical critical realist philosophy of science, pushes us to examine the process by which we break down social reality: abstraction. This gives a window into the ways we understand the world and, most importantly, leads to a path that helps us to break that world down in a methodical way. By interrogating the ways we abstract for understanding, we are able to see how we get to certain conclusions and how we can do so more explicitly and methodically in the future.

The fact that we abstract constantly seems obvious upon first glance. However, abstraction is so close to us that it is almost foreign (Ollman 2003). Abstraction is rarely talked about in most research projects. We can take human sight as an example of abstraction. Humans do not see the entire spectrum of light, only a small portion of it. We do not see microwaves, x rays and many others. Instead, our eyes evolved to block out those unnecessary waves for they are not germane to everyday existence. We do not think about all the light waves outside the spectrum, but our eyes are seemingly purposefully limited to maximize and focus cognitive power on the portion of the spectrum that matters most. The others are abstracted away. Once again, we do not think about this fact consistently; it simply happens.

While that may work well in a normal setting, social theory and social research require a more rigorous and explicit formulation of how we abstract, even though many social theorists abstract without doing so explicitly. Abstraction refers to how we delimit the totality for further understanding. Good abstractors show the ways they do so. Thus, throughout the study I will explicitly limit certain boundaries or temporal and geographic scopes of analysis in each section. This allows for a more clear understanding of what aspects are being abstracted in each portion of the study. Put briefly, in this project my method of breaking down the causes and salient histories that led to the financial crisis consisted of (1) reading relevant literature³¹ and searching through the sources of that literature for further reading, (2) finding consistencies in the overarching lines of history that fed into the crisis, (3) dividing and synthesizing these histories into easily comprehensible subject- or concept-specific areas, (4) explicitly formulating the temporal and spatial boundaries of each area – in other words, concretizing the level of generality, (5) analyzing those histories along such levels, and (6) adding the new levels back into the perspective as a whole, which enriches the overall depth of the analysis.³²

³¹ Secondary sources were used along with more primary government data such as The Financial Crisis Inquiry Commission Report 2011.

³² For example, I start by analyzing the Arrighian long-term theory of systemic cycles of accumulation which is deemed to be relatively cogent. Then, drawing from other sources, I add a new hegemonic epoch to the previously theorized US world hegemony: neoliberal globalization. That leads into the need for understanding the hegemony of neoliberalism and globalization, which according to the Arrighian definition

A dialectical critical realist philosophy of science is the basis for good theory, especially good social theory (Benton and Craib 2010; Steinmetz 2005; Ollman 2003). Dialectical critical realism is a mixture of general critical realist philosophy that takes a dialectical or internal relations philosophy as an ontology/epistemology. It is highly compatible with Frankfurt School style critical theory and both mutually reinforce each other. This perspective views social relations as fundamental parts of existence and as fundamental parts of defining things as previously mentioned, but also adds in the critical realist ideas of emergence and multicausality.

A critical realist theory of knowledge is “committed to the existence of a real world, which exists and acts independently of our knowledge or beliefs about it...” (Benton and Craib 2010:121). Concordant with Frankfurt School style critical theory, it “differs from empiricism in theorizing knowledge as a social process which involves variable ‘means of representation’” (Benton and Craib 2010:121). These variable means of representation require a “*reflexivity* about the conditions for a possibility for thought, or language, to represent something outside itself” (Benton and Craib 2010:121, emphasis in original). By subscribing to a dialectical conception of reality and reflexivity about representing an external reality through language, dialectical critical realism requires the use of dialectical concepts in an attempt to make reality and the representation of reality coincide more fully. Furthermore, the “critical realist(s) insistence on the independent reality of the objects of our knowledge, and the necessity of work to overcome misleading appearances, implies that current beliefs will always be open to correction in the light of further cognitive work,” meaning that it coincides closely with the Frankfurt version of critical theory (Benton and Craib 2010:121).

Critical realism puts positivist/anti-positivist debates almost to rest by moving them to a new level. Critical realism does this, in part, through the idea of emergence. Emergence refers to the fact that certain arenas of reality emerge from others. Take for example the act of speech. The ability to speak is based on our biology, psychology, and on physics, among other things. We could analyze our speech at the level of linguistics or psychology by

of hegemony requires both consent through the creation of ideology and organizational/juridical changes. Those analyses lead into a further discussion of financialization, and so on.

abstracting away the biological and physical aspects. However, the psychological portion of the speech act emerges from the fact that we have vocal chords, that we live in a place with air, and that sounds move through that air. Without the latter things, speech would be impossible, or at least very different. We may speak different languages or use different words, but these languages are based on and emerge from physical reality, though the causal mechanism can move both ways (Benton and Craib 2010).

This may seem like commonsense, but the idea of emergence has great impact on how research is done and what type of research is most salient for certain topics. In essence, critical realism and the concept of emergence show that there are rather fundamental differences between the methods of so-called “hard” sciences and the social sciences. Though the methods for understanding both may have many commonalities, I argue that these methods are different in numerous respects and that understanding social reality requires a method unlike that of the natural sciences, namely a historically oriented analysis.

One of the upshots of emergence and the differences between understanding social reality and physical reality is that for social reality there are no ironclad laws, only tendencies (Benton and Craib 2010). The law of gravity and the tendency for waning world hegemony to shift their economies toward finance have very different factors of generalizability. The laws of gravity apply to an immense and seemingly universal set of variables, while the tendency for waning hegemony to shift toward finance is relatively historically specific and applies only over the lifespan of capitalism. Moreover, even though each hegemonic transition has many factors that are quite similar to others, many differences can be found between each of them. Put slightly differently, some aspects of hegemonic transition are relatively transhistorical, while some are highly specific and contingent. The specific and contingent aspects emerge from the more transhistorical aspects and give different turns to those aspects. For example, there is a *tendency* for a waning hegemon in the world system to financialize its economy, however, under the processes of the globalization and financialization of the general production process itself, all actors in the world system *tend* toward financialization, but do not necessarily financialize as if acting under a natural law like gravity.

Another concept from critical realism that thoroughly informs the study is multicausality. Put simply, the idea of multicausality states that there can be numerous causes for something to happen (Benton and Craib 2010). This is opposed to an attempt at reducing causes to singular phenomena as is the practice in many types of social scientific research (Albritton 2007). The financial crisis is a great example of multicausality because so many different actors and organizational, juridical, and world systemic changes led into and “caused” the crisis.

For example, actors in the US financial system such as investors and debtors helped to create the housing bubble, which was a great part of the crisis. From a temporal scope of a few years and a geographical scope limited to the US, it seems that the housing bubble and those acting to create it caused the financial crisis. But, from a temporal perspective of decades that is still geographically limited to the US, changes in laws and banking practices allowed those actors to make decisions that added to that bubble, thus making such structural changes to the US economy a factor in the crisis. From an even more general perspective of centuries and shifting world hegemony, the financialization of the US economy as a whole led to those changes, due in great part to the long-term historical circumstances of the US economy at the time. Under the logic of that perspective, the systemic cycles of accumulation within the capitalist world system led to the financial crisis. However, as we will see, all of these aspects led into the financial crisis and an attempt to find a singular cause for the financial crisis is a rather fruitless endeavor.

In summation, a historical, political-economic perspective using dynamic critical theory supported by a dialectical critical realist philosophy of science gives a rigorous view of the long-term causes of the crisis, for critical theory, dynamic theory, dialectical ontology, internal relations philosophy, and critical realism all come together to mutually support one another as organizing concepts within a singular framework – they form a cohesive theoretical and philosophical background for the study. Furthermore, when these organizing concepts are used along with explicit abstractions the analysis is geared toward shifting through time and space explicitly and dynamically, which leads to the ability to continually shift focus and integrate new aspects into the analysis.

Vita

Shane Montgomery Willson was born to Olivia Danette and James Neil Willson in Memphis, Tennessee. After graduating from Amarillo High School in Texas, he returned to his home state to acquire a bachelor's degree in philosophy with a minor in economics from the University of Tennessee, Knoxville in 2006. After working as a bathtub refinisher for a few years, Shane returned to the academy in 2009 to study sociology with a concentration in political economy. He worked for one year as a research assistant for the Disproportionate Minority Contact Task Force. Since then he has worked as a researcher for the university's Office of Institutional Research and Assessment.

Shane taught an honors first-year-studies course entitled "The Films of Quentin Tarantino" in the fall of 2010 and taught another honors first-year studies course titled "How Movies and Television Create Social Reality" in the fall of 2011. He also co-taught two first-year-studies courses with Harry F. Dahms: "*The Matrix* and Social Theory" in the spring of 2010 and "How Movies and Television Create Reality" in the spring of 2011. He is also the founder and editor-in-chief of the peer-reviewed journal *Catalyst: A Social Justice Forum* and an assistant editor for *Current Perspectives in Social Theory*.

Shane completed his master's degree in sociology with a focus on political economy in December of 2011. He will continue to teach and do research as he works toward a PhD in the sociology department at the University of Tennessee, Knoxville.