

CAPITAL IN DISEQUILIBRIUM: UNDERSTANDING THE “GREAT RECESSION” AND THE POTENTIAL FOR RECOVERY

JOHN P. COCHRAN

ABSTRACT: The process of reabsorbing an economy’s various unemployed resources into new or expanding enterprises (i.e., economic recovery) potentially begins in the same moment that the discovery of and adjustment to previous errors and resource misallocations take place (i.e., the onset of recession). If all resources were perfectly homogenous and all prices, wages, and interest rates perfectly flexible, then the recession and recovery phases would indeed be a single process. Yet the fact that declines in economic activity are coupled with factors like non-homogenous capital, price rigidities, and time lags in adjustment processes means that the recession phase precedes the recovery, which is a second and lagging phase. Recession is further prolonged by interventions, especially those that create “regime uncertainty.” This paper argues that a capital structure based macroeconomics is a superior guide to policy.

KEYWORDS: business cycles, recession, recovery, monetary policy

JEL CLASSIFICATION: D90, E02, E3, E52, N1

John Cochran (cochranj@mscd.edu) is dean of the School of Business and Professor of Economics at the Metropolitan State College of Denver. An earlier version of this paper was presented at the 2009 SEA meetings. The author would like to thank Mark Thornton, Steve Hanke, and participants in the SDAE sessions in honor of Larry J. Sechrest at the 2009 Southern Economic associations meetings for useful comments and criticisms. The usual caveats apply.

INTRODUCTION

The summer 2007 world-wide financial crisis and the recession in the U.S. that followed later that year have caused a number of journalists and non-Austrian economists to recognize the essential element of the Austrian Business Cycle Theory (ABCT): monetary excess triggered by central bank actions “lead to a boom and an inevitable bust” (Taylor, 2008).¹ Responding appropriately to the current bust, or for that matter any crisis, requires first understanding the root cause. In the present situation, the underlying enabling cause was recently described from an Austrian perspective by Rizzo (2009) when he wrote that “[w]e must remember that the current state of affairs was caused by the Federal Reserve’s excessively low interest-rate policy from about mid-2002 through the third quarter of 2006,” which “resulted in significant economic distortions and/or imbalances.”

This represents a third period of major interest in ABCT or the Mises-Hayek business cycle theory, all of which have coincided with major economic disturbances. The first period in the 1930s followed Hayek’s University of London lectures in 1930–31 that were later published as *Prices and Production* (first edition 1931, later revised and enlarged for the 1935 second edition). These and other writings by Hayek during that period, as well as the accompanying criticisms and rejoinders (commonly known as the Hayek-Keynes debates, coincided with Great Depression (Cochran and Glahe, 1999). The second major period of interest coincided with the stagflation of the 1970s and early 80s and with Hayek being awarded the Nobel Prize in economics in 1974.

¹ See Forsyth 2009. For more detail see Taylor (2008, 2009). Other examples include Hanke (2008; 2009a, b; 2010a, b) and Balzli and Scheiessl (2009). Balzli and Scheiessl refer to William White as the “global banking economist” who “warned of the coming crisis.” See White (2006) for a sample of White’s use of ABCT. Leijonhufvud (2008, p. 1), regarding the current crisis wrote, “Operating an interest-targeting regime keying on the CPI, the Fed was lured into keeping rates far too low far too long. The result was inflation of asset prices combined with a general deterioration of credit quality. This, of course, does not make a Keynesian story. It is rather a variation on the Austrian overinvestment theme.” Hanke (2010b), in addition to providing data on the Fed’s culpability in creating the boom, also provides strong criticism of the “saving glut” explanation of the real estate bubble and boom.

Supplemented by Hayek's 1970s analysis as well as relevant extensions of the ABCT from more recent literature, this paper will argue that there are lessons for current business cycle research and policy based on the ABCT. Ultimately, economic recovery and return to sustainable growth must rest on a sound monetary institutional framework, a societal framework based on the rule of law, and highly competitive resource markets. All of these are insights provided by the Mises-Hayek framework.

BOOM AND BUST—WHAT NEEDS TO BE EXPLAINED

A dominant feature of "capitalistic" economies since approximately the beginning of the industrial revolution has been sustained (decade over decade) economic growth, accompanied by increasing per capita GDP and increases in living standards for the masses.² This long-term trend has been frequently interrupted by booms and busts. Explaining such cycles has occupied economic thinkers from the beginning of economics as a distinct discipline (Thornton, 2006). When Mises and Hayek began their work, most economists viewed the disproportionate fluctuations in future-oriented, time sensitive expenditures (i.e., investment) compared to consumption and near future-oriented expenditures as the most urgent empirical aspect of the business cycles that needed to be explained. Current data generated by the real business cycle (RBC) research agenda highlights that this is still the case today (Romer, 2006, pp. 174–78 and Cochran, Yetter, and Glahe, 2004). As summarized by Romer (2006, p. 176), data for the U.S. economy indicates that fluctuations in sub-components of GDP are uneven and that there is greater variability in time dependent, future-oriented production and "consumption" spending. While Romer shows variability during declines, he argues that "the same components that decline disproportionately [consumer durables and all activities under investment] when aggregate output is falling also rise disproportionately when output is growing at above-normal rates."

Austrian theory, as expanded by Garrison (2001) into a "capital based macroeconomics" but perhaps better conceptualized as a

² Skousen (2001, p. 15) provides representative data for the United Kingdom from 1100 to 1995.

capital structure-based macroeconomics, provides a business cycle framework consistent with these stylized facts. It also provides an explanation of why business cycles are a persistent feature in an economy with fractional reserve banking supported by a central bank.³

Using traditional aggregate data and non-Austrian theoretical frameworks, it is hard to distinguish booms from sustainable growth.⁴ Adding to the problem is the fact that growth generated during an unsustainable boom appears to be beneficial. However, in reality, per Sechrest (2006) and Garrison (2004), it is the boom times that play host to the plague of malinvestment, overinvestment and overconsumption. The bust brings readjustment and reestablishes the potential for sustainable growth. Recession should be understood as the period when past errors and misallocations of resources are discovered. Recovery, then, is the period where resources are reallocated to more sustainable patterns of use.

BOOM-BUST: THE CAPITAL STRUCTURE-BASED MACROECONOMIC⁵ EXPLANATION

The most completely developed aspect of a capital structure-based macroeconomics is the Austrian or Mises/Hayek theory of

³ For an excellent argument, set within an historical context, that central banks are “fundamentally *destabilizing*,” see Selgin 2010.

⁴ See Leijonhufvud (2007, p. 7) for similar argument regarding asset or financial bubbles. See Skousen (2007, pp. xii-xvi) for arguments on why traditional aggregate data are misleading measurements of economic activity from a structure of production perspective.

⁵ The version of this paper presented at the SEA meetings in November 2009 referred to this section as a “capital-based” explanation. Special thanks to Mark Thornton, who chaired and served as a discussant at this session of the 2009 Southern Economics/SDAE meeting, for suggesting that “capital structure based” macro was a more appropriate descriptor of this type of modeling. Capital structure more clearly separates this approach from real business cycle and other growth variants of modern mainstream economics, which use a capital concept in more highly aggregated constructs. Capital structure rather than capital-based also makes it more clear that the suggested modeling falls clearly into the Hayek (1941), Lachmann (1956) and Lewin (1999) framework. See Thornton (2005, pp. 58–70) and Hanke (2010b) for an application of a capital structure approach to booms and busts in real estate development, with an emphasis on skyscrapers.

the business cycle (ABCT). But as Garrison (2001, p. 240) points out, the theory is a theory of an unsustainable boom, and not a theory of recession or depression. To understand what happens during recession and recovery requires a “view of capital that is firmly rooted in individual planning in a disequilibrium world” (Lewin, 1999, p. 214).

First of all, what is a recession? An oft-repeated notion is one that defines it as two consecutive quarters of declining real GDP. The National Bureau of Economic Research offers this mechanical definition, contrasting recessions against expansions:

A recession is a significant decline in economic activity spread across the economy, lasting more than a few months, normally visible in real GDP, real income, employment, industrial production, and wholesale-retail sales. A recession begins just after the economy reaches a peak of activity and ends as the economy reaches its trough. Between trough and peak, the economy is in an expansion. Expansion is the normal state of the economy; most recessions are brief and they have been rare in recent decades.⁶

This definition can be very misleading if used to guide policy, and is consistent with an interpretation of a recession as being caused by too little aggregate demand rather than by a broad misallocation of resources.

A capital structure-based macroeconomics provides a better understanding of the cause and therefore better policy responses. Recessions are the economy’s reaction to resource misallocations when too many resources have been allocated to the wrong industries. Such a misallocation is, according to Hayek (1979, p. 8), “[t]he true, though untestable, explanation of unemployment [...] a discrepancy between the distribution of labor (and the other factors of production) among industries (and localities) and the distribution of demand among their products.”

But in a disequilibrium world, business plans are constantly being revised as new information is discovered and transmitted. The capital structure for an economy is the result of this planning

⁶ See “NBER’s Recession Dating Procedure, October 21, 2003” at <http://www.nber.org/cycles/recessions.html>.

and calculation process that depends on the decision-making environment. This suggests a

[v]iew of capital as a structure not a stock. In the first instance, the capital of an economy is embodied in a largely undesigned network of capital combinations of individual capital goods and human resources. This structure operates within a superstructure of (many undesigned) institutions like the institutions of money, of private property, commercial law, and, crucially, the private firm. Within the private productive organization that we refer to generically as the firm, capital combinations get made and changed against a backdrop of shared “ways of doing things” that serve to coordinate individual actions by harmonizing their expectations. (Lewin, 1999, p. 214)

Successful planning requires monetary calculation with a profit and loss feedback mechanism. A given business or entrepreneurial plan implies a time structure of production for the individual enterprise—a pattern of inputs (capital goods, labor and natural resources) applied at earlier dates followed by a pattern of outputs sold at later dates. Groupings of entrepreneurial plans imply a time structure of production for the economy as a whole that consists of interconnected/complementary plans or supply chains and competitive plans. Monetary calculation (forward-looking capital valuation) and the continuous feedback from profits and losses prod entrepreneurs to continuously adjust plans to the provision of goods and services most valued by consumers.

A boom is generated by monetary excesses, which falsify the calculation process in a systematic way. A boom-bust induced recession is a *mini-calculation failure*. Money and credit creation, coupled with their impact on interest rates, and the corresponding re-direction of money spending flows make planning and calculation much more prone to error. Normally reliable guides to planning, such as the use of capital asset pricing models (Sechrest, 2006, p. 28), if not used judiciously, mislead entrepreneurs into a cluster of errors ultimately creating conditions for a bust and financial crisis.⁷

The Austrian boom-bust cycle theory is an application of a general, though not generally accepted, principle of monetary theory known

⁷See Hanke (2010b) for an application of ABCT, referencing Sechrest’s capital budgeting methodology, to the current crisis with an emphasis on Dubai.

as Cantillon effects, and is an empirical proposition. The general principle of Cantillon effects is that spending patterns, including both “real spending” and spending on classes of assets, are altered depending on where new money enters the system. Hence, the allocation of resources and the valuation of assets (bubbles) are temporarily shaped by the non-neutrality of monetary changes. Resources are misdirected by changes in money expenditure flows that result from the flow of newly created money into the economy. The empirical proposition has two components: First, money creation is accompanied by credit creation, which reduces key interest rates relative to equilibrium rates. This keeps the *interest rate brake* from effectively working. Second, the resulting pattern of money expenditure directs resources into more labor saving and “roundabout” methods of production.⁸ In this scenario, what sets in motion the boom-bust cycle is credit creation facilitated by the central bank action. This in turn lowers or keeps market interest rates below the “natural rate” (Garrison, 2006). During the credit creation process, the central bank may be an active participant if it initiates the process, i.e., is the exogenous factor undertaking open market purchases or other actions that expand the monetary base, or, as is often the case under current central banking operations, acts as a passive participant by setting the interest rate or an inflation target. In this case, the central bank passively provides reserves to support an increased demand for credit (Cochran, Call, and Glahe, 2003). With market rates of interest below the natural rate, firms invest more and individuals save less (and consume more). If this were the entirety of the matter, there would be reason to believe that the boom, if begun from a period of high employment, would end in a “soft landing,” and leave the economy essentially where it started or, if begun with unemployed resources, would smoothly return the economy to a sustainable high-employment growth path.

However, the transition is not smooth because of developments related to time preferences and the role of interest rates as transmitters of information. Lower interest rates not only communicate to firms that they should invest more, but that they should invest in a different *structure of production*. If the interest rate had declined

⁸ General, detailed descriptions of the processes underlying such a boom, which provide a foundation for understanding the nature of a bust, are available in Garrison (2001, pp. 33–58) and Sechrest (2006, pp. 28–29).

due to a shift in the preferences of savers, it would have indicated that people had become more future-oriented. Such a preference change frees resources and makes available financing to support a more time-consuming, longer and more productive production processes. This more capital-intensive production structure would then be able to satisfy that greater demand for future consumption. In the absence of increased saving, a money and credit expansion encourages producers to lengthen the production structure while simultaneously encouraging consumers to undertake choices which would send market signals consistent with a shortening of the production structure. Long-term investment is booming at the same time that demand for final consumption goods is growing. Available resources are not sufficient to sustain both processes, resulting in the problem of the “dueling production structures” (Cochran, 2001a, p. 19). Thus the expansion of money and credit brings about *unsustainable growth*. Unsustainable growth is characterized by a pattern of overconsumption and overinvestment accompanied by *malinvestment* (Garrison, 2004). The concept of malinvestment illustrates how a boom driven by credit creation has extremely limited potential for a “soft landing” because the economy is developing a structure of production that is inconsistent not only with preferences but with itself. The transition from boom to bust begins as the inconsistencies in business plans become apparent. Because of this distortion of the capital structure, “[t]he recession periods of the business cycle then become inevitable, for the recession is the necessary corrective process by which the market liquidates the unsound investments of the boom and redirects resources” (Rothbard, 2000, p. xxvii).

Investment projects predicated on low interest rates start “feeling the crunch” as credit becomes increasingly expensive or unavailable. As the peak nears, booming demand for consumer goods may also frequently lead to rising input costs as the early and late stages of production bid against each other for scarce resources. Furthermore, because these business plans were also predicated on an incorrect assumption of the pattern of future demand, it is likely that expected demand for the outputs of some firms in the new, early stages of production will fail to materialize as anticipated. Malinvestment becomes apparent as some businesses are caught in this squeeze between a slack demand for output and

higher input prices. Thus, as interest rates and input prices rise while demand fails to meet expectations, firms and projects begin to fail and the recession begins. Firms adjust their plans to current conditions; some cease production or go bankrupt, while others cut costs and production. These adjustments account for the observed decline in real GDP, industrial production, gross investment and employment during a recession.

Those businesses attempting to respond directly to higher consumer demand may find their plans thwarted by a lack of complementary resources. Labor and other resources released from the declining early stages may not be easily absorbed into the expanding later stages of production because the necessary complementary capital goods are not readily available. During the bust phase, resources are released for other uses, but at least some of the capital goods created during the boom are not immediately useful in the expanding industries. As unemployment increases and losses mount, a “secondary depression” becomes a possibility as a consequence—not cause—of the bust.

What are the lessons from the Austrian approach to monetary and capital theory in the current environment? Recovery must be driven by a revival of investment, but to return to real stability and sustained growth the new pattern of investment must be in line with resource availability and time preferences. According to Hayek (1979, p. 42), this is not likely to be achieved by “subsidization of investment” or “artificially low interest rates.” Hayek (1939) argued that while such a policy may result in a temporary increase in production and employment, the ultimate result is a new period of boom and then bust.

This has been precisely the response of the U.S. economy to the overly expansionary monetary policy initiated to end the first recession of this century. In the wake of the dot-com bubble, the federal funds rate was set at one percent for nearly a year. As predicted by ABCT, this policy contributed to a distorted structure of production and a subsequent bust after the housing bubble.⁹ This policy, while temporally increasing production and employment, set the stage for future bottlenecks, imbalances, malinvestments

⁹ See Thornton (2009).

and distortions in the economy. Hayek finds a stimulus to consumer demand and any “investment” driven by such a stimulus even less desirable for long-run stability (1939, pp. 73–82 and 1979, p. 42).

While investment must lead a recovery, history has shown that a recession can become a depression, a long period of stagnation, a stagflation, or a hyperinflation-driven collapse if significant policy errors are committed. The depth and range of policy mistakes that contributed to past periods of delayed recovery are covered by Rothbard (2000), Woods (2009), Murphy (2009a), Ohanian (2009), Vedder and Gallaway (1993), Higgs (1997), and Powell (2002, 2009).

Hayek points to a complicating factor in determining the correct course for monetary policy that is particularly relevant for critiquing the current response by the monetary authorities. Taylor (2009) argues that the monetary policy response to the emerging financial crisis was the wrong action, based on a wrong diagnosis of the problem. According to Taylor’s analysis, central bankers responded as though there had been a liquidity crisis, when in fact the crisis was a counter party risk crisis. While Taylor’s analysis is important in understanding how and why the Fed allowed its balance sheet to balloon, Hayek raises other issues. Hayek argued that the first necessary step in monetary policy following a boom created by monetary excesses is to stop the inflation, i.e., stop the expansion of the nominal monetary spending stream, or at least hold it to the growth rate of real output. However, contra his arguments in the 1930s, policy should also endeavor to stop a deflation that provides no steering function, which he terms a “secondary deflation” or “secondary depression.”¹⁰ The current Fed policy is creating new asset bubbles and is again misdirecting resources through Cantillon effects, thus preventing the necessary relative price adjustments needed for appropriate resource realignment.

¹⁰ Many, including Hayek (Pizano, 2009, p. 13), attribute the depth and length of the Great Depression to just such a financial collapse and secondary deflation. By the 1970s, Hayek supported the idea that such phenomena should be prevented “by appropriate monetary measures.” See also Hayek (1979, pp. 15–19) for a discussion by Hayek on his positions in the 1970s compared to his positions in the 1930s.

CAPITAL THEORY: GROWTH AND/OR RECOVERY¹¹

What sets the stage for recovery, job creation, and ultimately growth? Recovery, like growth and development, requires forward-looking planning. Here, perhaps the best guide to policy comes from the developing literature examining the institutions that best support economic growth and development.¹² What best makes societies rich is also what will most likely bring about recovery and return the economy to sustainable growth. Austrian capital theory implies that a significant portion of current economic activity is directed not to current, but to future consumption.¹³ Planning and calculation include decisions on reinvestment to maintain current levels of production into the future as well as new investment for expansion and new enterprises, all of which are future oriented. Recovery, like sustained growth, requires an environment that facilitates the planning and development of projects which create current jobs, most of which will be directed toward future consumption. ABCT has historically emphasized impediments to adjustment caused by the non-homogenous nature and varying specificity of many capital goods and some “human capital.” These are a given aspect of any re-structuring of an economy (Sechrest, 2006, pp. 35–36), and they are unique

¹¹ Much of the following discussion draws on Cochran (2009a, b). For another Austrian interpretation of the bust to recovery phase, see Cwik (2008).

¹² The period from 1980 to 2005 illustrates how well markets can perform when freed even marginally from some of the collectivists’ constraints of the past. Shleifer (2009) characterizes this period as the “Age of Milton Friedman.” Per Schleifer (p. 123), “Between 1980 and 2005, as the world embraced free market policies, living standards rose sharply, while life expectancy, educational attainment, and democracy improved and absolute poverty declined.” He then asks, “Is this a coincidence?” After reviewing competing claims he concludes (p. 135), “On strategy, economics got the right answer: free market policies, supported but not encumbered by the government, deliver growth and prosperity.” I thank Steve Hanke for this reference. Capital structure as a key component of economic development is explored in detail and in an historical context by Shenoy (2007).

¹³ See Skousen (2007 [1990], pp. xi–xxxix) for an excellent summary. Skousen recommends moving toward a measure of Gross Domestic Expenditures to get a more realistic picture of the importance of business spending (future oriented) in total current economic activity. Whereas consumption appears to be approximately 70 percent of the economy based on GDP, measures of economic activity more in line with a capital structure view of the economy drop this number closer to 30 percent (Skousen, 2007, p. xvi).

to each crisis. The structure of production aspects of ABCT highlights these as problems impeding recovery.

Based on these capital structure impediments to recovery, some proponents of ABCT¹⁴ have implied or been interpreted as implying that longer credit expansions and induced booms create a correspondingly greater degree of distortion on the market and hence longer and more severe correction/recession periods. As discussed previously, malinvestments do have the potential to create losses and impede reallocation, but there is no necessary connection between the length of the boom, the degree of misallocations, and the actual severity of the recession and the length of the recovery process. One also has to take into consideration whether markets are being allowed to work and if the “regime” is certain; stable, predictable, and consistent with stated policy, and the policy is conducive to entrepreneurship and prudent risk taking. Policies that impede competition and impose excessive tax burdens—or that in any way simply add to costs, reduce expected returns, or increase the uncertainty of business activity—are seen as the most important factors in forestalling recovery and turning economic corrections into stagnation, stagflation or depression.”¹⁵ Historically, policies and actions that threaten property rights create “regime uncertainty” or “regime worsening,” and this delays recovery.

As pointed out in the *Wall Street Journal* “Review and Outlook” of March 6, 2009, “Recessions don’t last forever, but bad policies can prolong the pain.” While the current interventions and policy mistakes that aimed at easing the pain of the recession and stimulating recovery have not, as yet, risen to the 1929–1939 levels, there is currently little to encourage and much to discourage private

¹⁴ See Cochran (2001b) for a counter argument to this interpretation of ABCT, and Eichengreen and Mitchener (2003, p. 8) for an example of critics implying this argument is part of ABCT.

¹⁵ For a similar argument see Becker *et al.* (2010). For anecdotal evidence on the effect of regime uncertainty on decision making see Jackson (2010) where she, in an article on increasing foreclosures and declining prices in the luxury home market, quotes Edie Marks, long one of the Denver areas most successful luxury market specialists, “The people that have money are sitting in kind of a cocoon—they’re not making decisions because they’re concerned about what’s coming down in terms of taxation and vindictiveness against the wealthy.”

sector investment recovery.¹⁶ Recovery and growth are impeded, not stimulated, by policies that create “regime uncertainty” and/or a threat of regime worsening. Particularly relevant for regime worsening fears are proposals that make for less competitive labor markets, such as the misnamed Employee Free Choice Act, better known as “card check” (*Wall Street Journal* September, 2009) which would make union organizing easier and impose potentially costly binding arbitration. Also impeding recovery is regulatory uncertainty from proposed cost-increasing energy and environmental policies (e.g., cap and trade), increased protectionism (e.g., the 35 percent tariff on Chinese tires or the 10–16 percent future duty on Chinese pipes passed in December 2009 [Maher and Pulizzi, 2009]), and certain or projected higher tax burdens in the future. Especially relevant are burdens on capital income, and the use of the tax system explicitly for purposes of redistribution of income.¹⁷

Monetary authorities have over-reacted to the threat of a secondary deflation to the extent that policy now poses a significant threat of massive inflation¹⁸ in the future. Economic responses to similar policy shifts in the past are not encouraging. Besides the 1930s, the Great Society of Lyndon Johnson in the 1960s brought us the stagnation and inflation of the 1970s. More recently, Japan

¹⁶ Hanke (2009a) makes a similar argument in a worldwide context. Relative to the proper and correct use of lessons from history and proper policies during the current crisis he writes (p. 24), “President Hu took note of the main lesson of economic history: “go for free markets” and “prosperity [...] will follow.”

¹⁷ Edward Prescott, in remarks delivered June 23, 2009 in response to what depressed the U.S. economy 2008-IV and 2009-I-II, highlighted the fact that small business owners “rationally feared higher tax rates in the future and rationally cut investment” and “rationally cut employment.” See “Multiple Causes for Jobs Data Drop.” Letter to the Editor, *The Wall Street Journal*, September 11, 2008, p. A14, in which Cochran attributes some of the timing of the onset of the recent decline in real economic activity to the failure to renew the 2003 tax cuts, ensuring major tax increases in 2010. Becker *et al* (2010) provide a similar list of actual or proposed programs that have the added to uncertainty and created a “rather tepid rebound.”

¹⁸ See Murphy (2009) for a useful discussion on whether to “expect price deflation or inflation.” He concludes, “After reviewing the evidence and the theories offered by the two camps, I still believe that Bernanke’s unprecedented infusions of new reserves will lead to rapid price increases. These increases may not show up in the price of US financial assets, but they will rear their ugly heads at the gas pump and grocery checkout.”

endured a boom-bust cycle followed by a decade-long slump.¹⁹ Given the current significant expansion of the size of the U.S. government relative to GDP, Micheal Boskin (2009) reminds us that “[o]n the growth effects of a large expansion of government, the European social welfare states present a window on our potential future: standards of living permanently 30 percent lower than ours.”

Economic history and institutional analysis give us good insights into what impedes recovery and/or retards growth. Theory supported by that history indicates that an institutional framework of sound money, easy and predictable taxes, a stable legal environment built on a rule of law and contract enforcement, regime certainty (Higgs, 1997 and Shleifer, 2009), and broadly competitive markets encourage successful long-run planning and development. What then would be the Austrian policy recommendations for today’s problems?²⁰ First, according to Hayek (1979, pp. 15–19) and Rothbard (2000, pp. 185–86), stop the credit creation and inflation. Then, as previously discussed, prevent a secondary deflation. Further remove all government impediments to effective entrepreneurial planning by avoiding protectionist measures and allowing prices and wages to adjust as needed to restore market equilibrium. Cut tax rates, as was done in the incomplete reforms of the 1980s and during the crisis of 2001–2003, and drastically reduce the government budget (Rothbard, 2000, pp. 185–86). To prevent future boom-bust episodes, reform the monetary system from the current government monopoly to a market-determined medium of exchange.²¹

What is being done to mitigate the recession and promote recovery? Is it consistent with a framework that promotes entrepreneurial

¹⁹ See Benjamin Powell, “Japan,” *The Concise Encyclopedia of Economics* at <http://www.econlib.org/cgi-bin/printcee.pl>, Powell (2002, 2009), and Cochran, Yetter, and Glahe (2004).

²⁰ See Kraus (2009) for another view of policy in which a structure of production misalignment is the problem.

²¹ “I do not believe that we would have major industrial fluctuations if it were not for the present banking system, which in turn depends on the government monopoly of the supply of money. I have been driven into proposing the denationalization of money....” Hayek continues, “Anyhow, depressions are not the result of the operation of the market. They are the result of government controls, particularly in the sphere of monetary policy.” Hayek quoted in Pizano (2009, p. 10). See Garrison’s (2009) concluding section, “Lessons Learned.”

planning and job creation? Or is it more closely aligned with failed policies of the past that have retarded recovery and promoted stagnation. The Fed balance sheet is at \$2 trillion and growing. The crucial question is: does the current monetary policy response create significant problems moving forward? Does it set up significant future price inflation problems, a possible collapse of the dollar, stagflation and/or another boom-bust sequence? Complicating the picture of moving forward and “unwinding” the Fed’s current position is pressure from some to target not price stability but a 5–6 percent inflation rate in the CPI. Some economists believe that the correct target for the federal funds rate should now be significantly negative and with an actual effective limit of zero, pushing the Fed to undertake operations over and beyond the traditional targeting of the federal funds rate.²²

Instead of fiscal constraint and tax decreases, there is a massive expansion of government spending both actual and proposed, a guaranteed massive tax increase when the 2001–03 tax cuts expire automatically in 2010, tax increases on the rich (those making over \$250,000), and a proposed cap and trade policy to fight global warming (which is in fact a massive tax increase on productive and consumption activity that uses fossil fuel-based energy). Instead of privatization, government is organizing takeovers and bailouts of private business in the automotive and financial sectors. Many of these actions have been conducted in ways that violate contracts and supersede the rule of law. There are proposed wasteful government misdirections of production through subsidies and directives, such as an energy policy that promises “green jobs.” Even more significant is a concerted verbal assault on economic freedom and therefore the threat of “regime worsening” (Powell 2009) on a large scale. Combined, these have predictable long-run negative impacts on the economy. Galloway and Vedder (2000, p. 32) summarize succinctly what should be done:

The best they [entrepreneurs and workers] can hope for from government policymakers is, in the spirit of Hippocrates advising future doctors, that they do no harm. Given the phenomena that policy makers confront

²² See Duca, DiMartino, and Reneir (2009) for a well-presented overview of the extraordinary recent activities of the Fed. Cecchetti (2009), Garrison (2009), and Taylor (2009) are also relevant.

in the short-run are essentially unpredictable and given that their best efforts are the equivalent of medieval doctors *bleeding* their patients, the most appropriate short-run macroeconomic stabilization policy is to give the aforementioned entrepreneurs and workers maximum freedom to adjust to potentially disordinating shocks to the macroeconomy.

In the absence of real reform, Rothbard (2000, p. xxiii) saw the alternatives for the American economy in the 1980s as a choice between 1929-type depression and an inflationary depression of massive proportions. Among possible alternatives, the most likely outcome is a return of a 1970s-style decade-long period of high unemployment and inflation. Also possible are a decade-long Japanese-style stagnation or a permanent Eurosclerosis. There is, however, still time to change course and follow the Austrian path to sustainable prosperity, i.e., end government intervention in the economy and return to a sound money policy. Such a policy has been dubbed as harsh or too draconian, but the pain of a short, severe recession followed by renewed, sustainable growth and prosperity may actually be “comfortable and moderate compared to the economic hell of permanent inflation, stagnation, high unemployment, and inflationary depression” (Rothbard, 2000, p. xxiii) that is the likely outcome of a continuation of our current policy.

The correct road to recovery is the path to a “free and prosperous commonwealth.” Such a path would include a return to sound money, competitive markets and rule of law with a total level of government spending and tax burden that, as suggested by Gwartney *et al.*, absorbs no more than 15 percent of GDP. As Adam Smith (1776 [1776], p. xliii) expressed it in a 1755 paper,²³

[I]ittle else is requisite to carry a state to the highest degree of opulence from the lowest barbarism, but peace, easy taxes, and a tolerable administration of justice; all the rest being brought about by the natural course of things. All governments which thwart this natural course, which force things into another channel or which endeavor to arrest the progress of society at a particular point, are unnatural, and to support themselves are obliged to be oppressive and tyrannical.

This recession now rivals the 1970s and early 1980s in severity and for many is the most significant crisis since the 1930s. A lesson that

²³ Quoted by Edwin Cannan in his “Editor’s Introduction.”

should be learned is that money and credit creation is ultimately a major destructive power that misdirects production and falsifies calculation even in a period of relatively stable prices. An economy with a complex financial system like the present banking system, which in turn depends on the government monopoly of the supply of money, will be prone to cycles and crisis even with the best of management.²⁴ Without a foundation of sound money, cycles are inevitable and destructive not only of short-term economic well-being, but potentially destructive of long-term freedom and prosperity if the crisis is used as an excuse to bring back the dead hand of collectivist policies. In the midst of the current crisis, it is more urgent than ever that we follow Hayek in his proposal for drastic monetary reform. He was driven “into proposing the denationalization of money” (Pizano, 2009, p. 10) and a return to a market-determined money.

Hayek highlighted the complexities of the dynamics of capitalistic production embedded in a structure of production. Maintaining a structure of production, which takes place through time, requires constant replacement of consumed capital goods. While this development of capital theory was initially part of Hayek’s attempts to provide a better foundation for his business cycle theory, the capital structure concept also provides the foundation for a better understanding of the complexities that underlie the critical arguments in the calculation debate and the use of knowledge in society. It is of extreme importance in better understanding the nature of economic development and growth and recovery.

REFERENCES

- Balzli, Beat, and Michael Schiessl (transl. Christopher Sultan). 2009. “The Man Nobody Wanted to Hear: Global Banking Economist Warned of Coming Crisis.” *Spiegel Online*, 8 July, available at <http://www.spiegel.de/international/business/0,1518,635051,00.html>.

²⁴ Particularly relevant is Garrison’s (2009) observation that, “Policy-induced booms tend to piggyback on whatever economic development is underway.” The interest rate brake which would normally stop such events before they turn into bubbles or booms is effectively, by central bank action, neutered (Hayek, 1941, pp. 406–10). Because of this neutering, booms and busts remain a significant threat under an interest rate targeting (Leijonhufvud, 2008, p. 1) or “learning by doing” policy framework (Garrison 2009).

- Becker, Gary S., Steven J. Davis, and Kevin M. Murphy. 2010. "Uncertainty and the Slow Recovery." *Wall Street Journal*, 4 January: A17.
- Boskin, Michael. 2009. "Obama's Radicalism is Killing the Dow." *Wall Street Journal*, 6 March.
- Cecchetti, Stephen G. 2009. "Crisis and Responses: The Federal Reserve in the Early Stages of the Financial Crisis." *Journal of Economic Perspectives* 23, no. 1: 51–75.
- Cochran, John P. 2009a. "Return of the Dead Hand." *Mises Daily Article*, 24 June, available at <http://mises.org/story/3516>.
- . 2009b. "A Free and Prosperous Commonwealth." *Mises Daily Article*, 20 March, available at <http://mises.org/story/3373>.
- . 2008. "Multiple Causes for Jobs Data Drop." Letter to the Editor, *The Wall Street Journal*, 11 September: A14.
- . 2001a. "Capital-Based Macroeconomics." *The Quarterly Journal of Austrian Economics* 4, no. 3: 17–26.
- . 2001b. "Hayek's Law and Rothbard's Wisdom." *Mises Daily Article*, 22 August, available at <http://mises.org/daily/765>.
- Cochran, John P., Steven T. Call, and Fred R. Glahe. 2003. "Austrian Business Cycles: Variation on a Theme." *The Quarterly Journal of Austrian Economics* 6, no. 1: 67–73.
- Cochran, John P., and Fred R. Glahe. 1999. *The Hayek-Keynes Debate—Lessons for Current Business Cycle Research*. Lewiston, New York: The Edwin Mellen Press. 2009.
- Cochran, John P., Noah Yetter, and Fred R. Glahe. 2004. "Capital-Based Macroeconomics: Boom and Bust in Japan and the U.S." *Indian Journal of Economics and Business* 3, no. 1: 1–16.
- Cwik, Paul F. 2008. "Austrian Business Cycle Theory: A Corporate Finance Point of View." *The Quarterly Journal of Austrian Economics* 11, no. 1: 60–68.
- John V. Duca, Danielle DiMartino, and Jessica J. Reneir. 2009. "Fed Confronts Crisis by Expanding Role As Lender of Last Resort," *Economic Letter: Insights from the Federal Reserve Bank of Dallas* 4, no. 2.

- Eichengreen, Barry, and Kris Mitchener. 2003. "The Great Depression As a Credit Boom Gone Wrong." *BIS Working Papers No. 137*. Basel: Bank for International Settlements, available at <http://www.bis.org/publ/work137.pdf>.
- Forsyth, Randall W. 2009. "Ignoring the Austrians Got Us in This Mess," *Barron's*, 12 March.
- Gallaway, Lowell, and Richard Vedder. 2001. "The Fraud of Macroeconomic Stabilization Policy." *The Quarterly Journal of Austrian Economics* 3, no. 3: 19–33.
- Garrison, Roger W. 2009. "Interest-Rate Targeting During the Great Moderation." *Cato Journal* 29, no. 1: 187–200.
- . 2006. "Natural and Neutral Rates of Interest in Theory and Policy Formulation." *The Quarterly Journal of Austrian Economics* 9, no. 4: 57–68.
- . 2004. "Overconsumption and Forced Savings in the Mises-Hayek Theory of Business Cycle," *History of Political Economy* 36, no. 2: 323–49.
- . 2001. *Time and Money: The Macroeconomics of Capital Structure*. New York: Routledge.
- Gwartney, James, Randall Holcombe, and Robert Lawson. 1998. "The Scope of Government and the Wealth of Nations." *Cato Journal* 18, no. 2: 163–90.
- Hall, Robert, Martin Feldstein, Jeffrey Frankel, Robert Gordon, Christina Romer, David Romer, and Victor Zarnowitz. 2010. "The NBER's Recession Dating Procedure" Cambridge, Mass.: National Bureau of Economic Research, available at <http://www.nber.org/cycles/recessions.html>
- Hanke, Steve. 2010a. "The Great Dissemblers." *GlobeAsia*, May: 24–26.
- . 2010b. "Booms and Busts." *GlobeAsia*, January: 18–20.
- . 2009a. "Hu versus Sarkozy." *GlobeAsia*, November: 22–23.
- . 2009b. "The Credit Triangle." *GlobeAsia*, January: 164–65.
- . 2008. "Banking Crisis: Plus Ça Change...." *GlobeAsia*, November: 168–69.

- Hayek, Friedrich A. 1979. *Unemployment and Monetary Policy: Government as Generator of the "Business Cycle."* San Francisco: Cato Institute.
- . 1941. *The Pure Theory of Capital*. Chicago: Midway, 1975.
- . 1939. *Profits, Interest, and Investment and Other Essays on the Theory of Industrial Fluctuations*. Clifton, N.J.: Augustus M. Kelley, 1975.
- . 1935. *Prices and Production*, 2nd ed. Clifton, N. J.: Augustus M. Kelley, 1967.
- . 1933. *Monetary Theory and the Trade Cycle*. Clifton, N.J.: Augustus M. Kelley, 1966.
- Higgs, Robert. 1997. "Regime Uncertainty: Why the Great Depression Lasted so Long and Why Prosperity Resumed After the War." *The Independent Review* 1, no. 4: 561–90.
- Jackson, Margaret. 2010. "Foreclosures Mounting for Luxury Homes." *The Denver Post*. 3 January.
- Keynes, John Maynard. 1936. *The General Theory of Employment, Interest, and Money*. London: MacMillan, 2007.
- Kraus, Wladimir. 2009. "A Thought Experiment Comparing Austrian and Keynesian Stimulus Packages." *Libertarian Papers* 1, no. 40, available at: <http://libertarianpapers.org/2009/40-kraus-thought-experiment-austrian-keynesian-stimulus/>
- Lachmann, Ludwig. 1956. *Capital and Its Structure*. Kansas City: Sheed Andrews and McMeel, 1978.
- Lewin, Peter. 1999. *Capital in Disequilibrium: The Role of Capital in a Changing World*. London and New York: Routledge.
- Leijonhufvud, Axel. 2008. "Keynes and the Crisis." *Center for Economic Policy Research Policy Insight* No. 23.
- . 2007. "Monetary and Financial Stability." *Center for Economic Policy Research Policy Insight* No. 14.
- Maher, Kris, and Henry J. Pulizzi. 2009. "Chinese Slapped in Steel Dispute." *The Wall Street Journal*, 31 December.
- Murphy, Robert P. 2009a. *Politically Incorrect Guide to the Great Depression and the New Deal*. Washington, D.C.: Regnery.

———. 2009b. "A Case for the Inflation Camp." *Mises Daily Article*, 14 December, available at <http://mises.org/daily/3933>.

Ohanian, Lee. E. 2009. "What—or Who—Started the Great Depression." *Journal of Economic Theory* 144, no. 6: 2310–233.

Pizano, Diego. 2009. *Conservations with Great Economists: Friedrich A. Hayek, John Hicks, Nicholas Kaldor, Leonid V. Kantorovich, Joan Robinson, Paul A. Samuelson, Jan Tinbergen*. New York: Jorge Pinto Books.

Powell, Benjamin. 2009. "U. S. Recession Policies: Nothing New Under the (Rising) Sun." *The Intercollegiate Review* 44, no. 2: 13–21.

———. 2007. "Japan." In David R. Henderson, ed., *The Concise Encyclopedia of Economics*. Indianapolis, Ind.: Liberty Fund.

———. 2002. "Explaining Japan's Recession." *Quarterly Journal of Austrian Economics* 5, no. 2: 35–50.

Rizzo, Mario J. 2009. "The Misdirection of Resources and the Current Recession." *Mises Daily Article*, 19 February, available at <http://mises.org/story/3348>.

Romer, David. 2006. *Advanced Macroeconomics*, 3rd ed. Boston: McGraw-Hill Irwin.

Rothbard, Murray N. 1963. *America's Great Depression*. Auburn, Ala.: Ludwig von Mises Institute, 2000.

Sechrest, Larry J. 2006. "Explaining Malinvestment and Overinvestment." *The Quarterly Journal of Austrian Economics* 9, no. 4: 27–38.

Selgin, George. 2010. "Central Banks as Sources of Financial Instability." *The Independent Review* 14, no. 1: 485–96.

Shenoy, Sudha R. 2007. "Investment Chains through History or an Historian's Outline of Development: 'Using Goods of Ever Higher Orders.'" *Indian Journal of Economics and Business, Special Issue*: 185–215.

Shleifer, Andrei. 2009. "The Age of Milton Friedman." *Journal of Economic Literature* 47, no. 1: 123–35.

Skousen, Mark. 2001. *The Making of Modern Economics: The Lives and Ideas of the Great Thinkers*. Armonk, N.Y. and London: M.E. Sharpe.

———. 1990. *The Structure of Production with a New Introduction*. New York and London: New York University Press, 2007.

- Smith, Adam. 1776. *An Inquiry into the Nature and Causes of the Wealth of Nations*. Dunwoody, Ga., 1976.
- Taylor, John B. 2009. *Getting Off Track: How Government Actions and Interventions Caused, Prolonged, and Worsened the Financial Crisis*. Stanford, Calif.: Hoover Institution Press.
- . 2008. “The Financial Crisis and the Policy Response: An Empirical Analysis of What Went Wrong.” Working paper, available at <http://www.stanford.edu/~johntayl/FCPR.pdf>.
- Thornton, Mark. 2009. “The Economics of Housing Bubbles.” In Randall G. Holcombe and Benjamin Powell, eds. *Housing America: Building Out of a Crisis*. New Brunswick, N.J.: Transaction Publishers, 237–62.
- . 2006. “Cantillon on the Cause of the Business Cycle.” *Quarterly Journal of Austrian Economics* 9, no. 3: 45–60.
- . 2005. “Skyscrapers and Business Cycles.” *Quarterly Journal of Austrian Economics* 8, no. 1: 51–74.
- Vedder, Richard K., and Lowell E. Gallaway. 1993. *Out of Work: Unemployment and Government in Twentieth-Century America*. New York and London: Holmes and Meier.
- The Wall Street Journal*. 2009a. “A Gift for Labor.” 17 September: A22.
- The Wall Street Journal*. 2009b. “Review and Outlook.” 6 March.
- White, William R. 2006. “Is Price Stability Enough?” *BIS Working Paper No. 205*. Basel, Switzerland: Bank for International Settlements.
- Woods, Thomas E. Jr. 2009. *Meltdown: A Free-Market Look at Why the Stock Market Collapsed, the Economy Tanked, and Government Bailouts Will Make Things Worse*. Washington D.C.: Regnery.