

THE FEDERAL RESERVE AND THE DOLLAR

Lewis E. Lehrman

To evaluate the history of the Federal Reserve System, we cannot help but wonder, whither the Fed? and to consider wherefore its reform—even what and how to do it. But first let us remember whence we came one century ago.

The End of the Classical Gold Standard

No one knew better than Jacques Rueff, a soldier of France and a famous central banker, that World War I had brought to an end the preeminence of the classical European states system and its monetary regime—the classical gold standard. World War I had decimated the flower of European youth; it had destroyed the European continent's industrial primacy. No less ominously, the historic monetary standard of commercial civilization had collapsed into the ruins occasioned by the Great War. The international gold standard—the gyroscope of the Industrial Revolution, the common currency of the world trading system, the guarantor of more than 100 years of a stable monetary system, the balance wheel of unprecedented economic growth—was brushed aside by the belligerents. Into the breach marched unrestrained central bank credit expansion, the express government purpose of which was to finance the colossal budget deficits occasioned by war and its aftermath.

Cato Journal, Vol. 34, No. 2 (Spring/Summer 2014). Copyright © Cato Institute. All rights reserved.

Lewis E. Lehrman is Chairman of the Lehrman Institute. This article is adapted from his closing address at the Cato Institute's 31st Annual Monetary Conference. He thanks John Mueller for helpful comments.

The Rise of Discretionary Central Banking

With the benefit of hindsight we can see that quantitative easing (QE) was actually inaugurated with World War I. We can see also that discretionary central banking in the United States coincided with the founding of the Federal Reserve System. After the banking panic of 1907, the Federal Reserve Act of 1913 was designed to provide “an elastic currency” but also to reinforce the international gold standard. Thus, Federal Reserve sponsorship of floating exchange rates in 1971 would become one of the great ironies of American monetary history.

To interpret the financial events associated with the Great War and their effect on the ensuing 100 years, my colleague John Mueller and I have highlighted two crucial events of 1913. First, of course, was the establishment of the Federal Reserve System, and second, the publication by the young John Maynard Keynes of his book, *Indian Currency and Finance*. The inauguration of the Federal Reserve and the intellectual foundation provided by the monetary ideas of Keynes, taken together, soon gave rise to a perfect intellectual and financial storm—a storm which would last a century.

The Influence of Keynes

Keynes had argued in his book *Indian Currency and Finance* that whether a central bank holds its reserves in gold or in foreign exchange “is a matter of comparative indifference,” and that “in her Gold-Exchange Standard, . . . India, so far from being anomalous, is in the forefront of monetary progress” heading toward “the ideal currency of the future” (Keynes 1913: 30, 259, 36). In this prewar book, Keynes foresaw the interwar reserve currency roles of sterling and the dollar—an official reserve currency system that Keynes and other British monetary experts succeeded in pressing the European Great Powers to adopt at the Genoa Conference of 1922. By displacing the classical gold standard, and by avoiding deficit settlements in gold, it is no secret that Keynes hoped to forestall repayment of huge sterling debts held by other countries in the form of sterling foreign exchange reserves. Moreover, in the absence of the reserve currency roles of the dollar and sterling, the wars, budget deficits, and balance of payments deficits of the Great Powers could not be so easily financed, except by onerous taxation. Would a postwar democratic people vote in the majority to tax themselves for these purposes? If not, would

the inevitable outcome of government policy be inconvertibility, floating exchange rates, and discretionary central banking? We shall see.

Rueff's Dissent

In 1932, ten years after Genoa, and after Britain had abandoned sterling convertibility to gold in 1931, Rueff analyzed the real-world problems of Keynes's reserve currency theory, and he described the role of the gold exchange standard, a reserve currency system based on sterling and the dollar, in causing the 1930 financial crisis and the Great Depression. Briefly, Rueff ([1932] 1964: 52–53) pointed out that when a monetary authority accepts dollar or sterling claims for its official reserves, instead of settling its balance of payments deficits in gold, purchasing power “has simply been duplicated, and thus the American market is in a position to buy in Europe, and in the United States, at the same time”—tending to cause asset or price inflation. The same was true of the British market. Conversely, the sudden, rapid liquidation of official sterling and dollar reserves could cause equally rapid shrinkage of the banking and credit system, leading to deflation and depression as in the 1930–33 episode.

In disagreement with Keynes and Irving Fisher (whose monetary theories would later be adopted by Milton Friedman), Rueff argued that in a reserve currency system “high-powered” money must include both domestic and foreign official monetary liabilities. After World War II, the same gold exchange standard, based this time on the unique reserve currency role of the dollar, was reestablished at the heart of the Bretton Woods international monetary system. Though it was an improvement on the interwar monetary system, Rueff correctly predicted (and tried to prevent) the dissolution of Bretton Woods, which, after perennial foreign exchange crises, collapsed in 1971.

I cite Rueff's experience during the interwar period because, among other major events, he was involved in the successful stabilizations of the French franc after the two World Wars. As secretary of the French Treasury, and as deputy governor of the French central bank, his hands-on experience reinforced his path-breaking views on monetary economics. I recommend his theoretical and policy studies not least for the practical reason that his genius inspired two vital restorations of franc convertibility to gold and renewed French economic growth in 1926 and 1959, even as Great Britain failed in 1925,

and the United States in 1971. Rueff's success, I believe, was in part due to the fact that he was not only a gifted monetary economist but a successful practitioner, whereby he had shorn himself of the illusions of his academic counterparts.

Considering his more than 20 publications, a few of which have been translated to English, I can focus only on several Rueffian axioms—especially those linked to central banking. I shall try to put them in the context of one century of Federal Reserve operating techniques and their results.

Axiom 1: Central Banks Cannot Determine the Quantity of Money in Circulation

If a country decides to establish a central bank, Rueff's fundamental rule by which to guide the central bank is to understand that no central bank, not even the mighty Federal Reserve System, can determine the quantity of money *in circulation*—except perhaps in a totalitarian social order. In taking this position, Rueff departed from then-ascendant Keynesian orthodoxy. Rueff and Keynes debated one another on monetary economics as did Rueff and Irving Fisher, whose monetary theories Milton Friedman later modified, and they used the terms money and cash balances interchangeably. As Rueff pointed out in his trenchant summary of their differences, “The Fallacies of Lord Keynes’ General Theory” (Rueff 1947), “for Keynes, the quantity of money which the banking system has created is a datum. The total amount of individual cash holding has to be adapted to it. I am convinced, on the contrary, that it is the total of cash holdings desired by individuals which, thanks to the mechanism of [monetary] regulation, determines the quantity of money in circulation” (Rueff 1947: 357). Keynes declared in chapter 13 of *The General Theory* that “the quantity of money is not determined by the public.” Moreover, he presumed that the authorities can “control the activity of the economic system by changing the quantity of money” (Keynes [1936] 1965).

In the end, neo-Keynesians and monetarists who believed that the central bank can determine the quantity of money in circulation—and thereby successfully “govern” the economy—could not deny the evidence of reality. Taking only one example, between 2008 and 2013, the Federal Reserve more than quadrupled the monetary base, but the quantity of money in circulation (say M1) increased only a

small fraction in proportion to the central bank's monetary base. Subsequently, the CPI increased on average only 2 percent annually. There has, of course, been a great asset price inflation, but economic recovery has been the slowest of the postwar years.

Does it matter that the Federal Reserve cannot determine the quantity of money in circulation? Consider what happens when the Fed suppresses interest rates to near-zero and issues massive amounts of new money and credit to pay for purchases of Treasury and mortgage-backed securities during periods of sustained quantitative easing (2008–13). But market participants may not desire to hold all of the new money and credit issued. The market outcome must be interest rate arbitrage by speculators and investors who get the new credit first. But interest rate suppression and sustained, excess, undesired money are the necessary conditions of asset or price inflation, since interest rate arbitrage causes total demand for higher yielding assets to exceed total supply, the interest rate arbitrage thus causing mainly asset price inflation. Banks, brokers, and speculators, with marketable collateral and ready access to the banks, commandeer the new credit at near-zero interest rates. With cheap new money the financial elites buy and arbitrage, worldwide at little risk, all relatively undervalued financial assets, foreign exchange, commodities, real estate, farmland, and art—any asset they believe will protect against future asset and price inflation and is likely to be profitable during the period where asset prices are sustained by quantitative easing. Since the consumer price index or consumer products are not the betting objects of banker-broker-investor speculation, the illusion persists of low inflation (as it is conventionally measured by the CPI). But economic wealth does not consist only of current consumption goods. Commodities, real estate, and financial assets, which may be considered claims on future consumption goods, are articles of wealth desired in the market. Thus, a great global asset inflation can hoodwink the population and the government economists whose defective economic models are focused not on the inequalities of asset wealth caused by interest rate suppression and QE but, rather, on the CPI (i.e., consumption goods). As in the past, only when the asset bubble bursts will the scales drop from their eyes—and after the damage is done.

Moreover, there is a profound difference between Fed-issued nominal cash balances and the subsequent purchasing power of the real cash balances remaining after the asset price inflation

is complete. Asset (and price) inflation—occasioned by interest rate suppression and excess nominal cash balances put in circulation—is proportional to the difference between the nominal cash balances issued by the banking system and the amount of cash balances market participants *desire* to hold. The undesired difference is offloaded on assets or goods. After the (asset or price) inflationary process is complete, the nominal cash balances then in circulation have been depreciated in purchasing power—to the level of real cash balances. In a word, the market process of quantitative easing in the long run depreciates the purchasing power of the dollar, whether in terms of current consumer goods or assets representing claims on future consumer goods, or both.

Conversely, when market participants as a whole, for whatever cause, desire to increase their cash balances, then the price level must fall as market participants sell assets and also refrain from buying, in order to raise the cash balances they desire to hold. In this deflationary case, the purchasing power of the dollar would be rising. This was the case in 2008.

If then, a central bank cannot determine either the quantity of money in circulation or the rate of economic growth, what according to Rueff can a central bank realistically do? To conduct operations of the central bank, there must, of course, be a target. But if the target is manifold—embracing price-level stability, full employment, and interest rates deemed consistent with a certain level of money and credit—central bankers must know not only the magnitude of the quantity of money actually desired in the market but also the future desire to hold cash balances. It is true that central and commercial banks supply cash (and/or credit) balances, but it is individuals and businesses in the market—the users of money—who decide for themselves the cash balances they wish to hold or to spend. This they do for their own multiple preferences.

Axiom 2: Use the Bank Rate to Adjust the Demand and Supply of Money

Jacques Rueff took pains to clarify the nature and limits of central bank powers in the form of another general axiom: use the discount or “bank rate” to adjust the demand and supply of money (i.e., cash balances). Because the money stock cannot be precisely determined by the Federal Reserve, nor can it determine precisely the rate of

inflation and economic growth, it follows that the monetary policy of the central bank should not target the money supply, rate of interest, rate of inflation, employment, or economic growth. But if the goal of the central bank were to rule out sustained inflation and deflation—that is, a market-based policy consistent with the optimum use of the factors of production associated with steady economic growth—then, the operating target of the central bank must simply be to influence the supply of cash balances in the market such that they tend over time to equal the level of desired cash balances. Such a goal is scaled to the humble wit of man. To attain this goal the central bank must abandon hyperactive open-market operations (e.g., QE) that give off false price signals and more than anything else destabilize both the financial and economic markets.

Instead the central bank, having abandoned open-market operations, must then remobilize the discount rate. The central bank would set the discount rate above the market rate when, for example, the price level is rising—providing money and credit only at an interest rate that is not an incentive to create excess cash balances. In fact, sustained, undesired, excess cash balances constitute the necessary condition of inflation. Indeed, if the principal target of a workable monetary policy were a stable monetary order, long-run stability of the general price level, and optimum economic growth, the banking system should supply bank credit and currency in the amount approximately equal over time to the demand for them. Now, if the supply of cash balances is approximately equal to the desire to hold them, the price level must tend toward reasonable, long-run, stability. So too the monetary order. If there were no excess cash balances, there would be no excess demand, and thus, there could be no sustained rise in the price level. Moreover, with such a target there should be no sustained deflation caused by scarcity of desired cash balances. Because, in scarcity circumstances associated with incipient deflation, the central bank would lower the discount rate below the market rate and monetize eligible, liquid financial claims offered to the central bank—thereby supplying scarce cash balances to the participants in the markets who desired them.

Axiom 3: A New Quantity Theory of Money

Rueff's monetary theory and policy finally came to grips with—indeed, it modified—the famous and controversial Law of Markets of

Jean-Baptiste Say, abuilding of course on Say's insights but perfecting the flawed quantity theory of money.

Irving Fisher had carefully distinguished between money and bank credit in stating his famous "equation of exchange" in *The Purchasing Power of Money* (Fisher 1911): $MV + M'V' = PT$, where M is the supply of money, M' the supply of bank credit, and V and V' referred to the "velocity of the circulation" of money and bank credit, respectively. For Fisher, unlike modern monetarists, P and T referred to the price and transactions volume of all wealth exchanged for money—including financial claims and capital goods, not just the final products of labor and capital (or to use more recent terminology, of human and nonhuman capital). Later monetarists, following Milton Friedman, lump the M 's and V 's together so that they refer to composite money-plus-credit aggregates and use the formula $MV = PY$, where P and Y refer only to the price and volume of final output of goods and services, measured for example by GNP or GDP. Rueff pointed out that Fisher's (and by extension, Friedman's) Equation of Exchange is always true, "because it simply states that the amount of payments made over a certain period is identically equal to the value of goods paid for during this period. However, the Equation of Exchange, like the quantity theory, calls for a basic reservation as regards the meaning to be ascribed to it. As a matter of fact, in the form in which we have stated it, and contrary to what is too commonly believed, the equation of exchange does not allow for any causal interpretation. In particular, nothing in this theory would justify the assertion that changes in the quantity of money should always be the cause of variations in the general price level" (unpublished Lehrman Institute translation, in Rueff's *Collected Works*, Vol. 1: 19–20). As an empirical matter, Rueff found that V and V' tended to vary with the business cycle—rising and falling with wholesale prices (endogenous more than exogenous or causal).

In *A Monetary History of the United States, 1867–1960*, Friedman and Anna Schwartz (1963) lumped together money and credit into aggregates they called the "money stock," and strongly implied exactly the causal relation between money and income against which Rueff had warned. Friedman and Schwartz (1963: 676) write:

Throughout the near-century examined in detail we have found that: 1. Changes in the behavior of the money stock have been associated with changes in economic activity,

money income, and prices. 2. The interrelation between monetary and economic change has been highly stable. 3. Monetary changes have often had an independent origin; they have not been simply a reflection of changes in economic activity. These common elements of monetary experience can be expected to characterize our future as they have in the past.

It may be argued that Friedman's "highly stable interrelation" between monetary and economic change was mostly a function of the relative stability of the classical gold standard and the gold exchange standard during much of the period Friedman studies. Thus, Friedman's expectation—that such stable "monetary experience" under different forms of the gold standard and fixed exchange rates would "characterize our future"—could not survive his successful campaign to destroy the attenuated vestiges of the true gold standard incorporated in the Bretton Woods gold-exchange standard, inaugurating the era of inconvertible currencies and floating exchange rates (1971–present), associated as it has been with increased monetary and economic instability.

Rueff (1927, 1945, 1947, 1949, 1955) reformulated the quantity theory of money in the following proposition: aggregate demand is equal to the value of aggregate supply, augmented (+/–) by the difference in the variations during the same market period, between the quantity of money in circulation and the aggregate cash balances desired. Rueff's macroeconomics, unlike that of Keynes, starts from the bottom up, not the top down.

Rueff begins by noting that the equilibrium of the quantity supplied (s) and demanded (d) in the market for any good can be described as:

$$(1) d = pq = s,$$

where p and q are the price and quantity actually exchanged. This is what is described by normal supply and demand curves. We assume that prices are flexible, or that the period under consideration is long enough so that p and q reach equilibrium.

If we sum up the demand and supply of all goods exchanged, we get:

$$(2) D - PQ = S,$$

where D is the total demand of money against goods, S is the total supply of goods exchanged, and P and Q are indexes of the

average price level and the volume of goods sold in a given period, compared with some base period. (Actually, Rueff's equation is $D = kPQ$, where k is a constant relating current dollars to the values of P and Q in the base period. To keep the notation simple, I have assumed that $k=1$, and that the price index $P=1$ to begin with.)

Rueff showed that when P and Q are weighted by the volume of each good actually exchanged, their value is independent of shifts in demand among the various goods exchanged. And so "the general price level index varies directly with total supply of goods against money, and thereby conforms to the general law of supply and demand, like all particular prices" (Rueff 1927: vol. 2: 19).

In short, the change in the price level is equal to the difference between total demand and total supply:

$$(3) D = Q + dP, \text{ or, } D - Q = dP.$$

So we find Rueff, in 1927, discarding the crude quantity theory of money, and speaking in terms of aggregate demand a decade before Keynes. And he points out that the price level is inversely related to the total supply of goods, five decades before the American supply-siders with their "policy mix."

As Rueff summarized his formulation worked out in *Social Order*,

The quantity theory of money can be stated as follows: the general price level varies only as a result of the difference between the simultaneous variations of the total amount of total actual cash balances and total desired cash balances. As long as the variations of the former equal the variations in the latter, the general price level is indifferent to supply and demand, because if supply increases, demand increases accordingly. Similarly, the general price level is indifferent to an increase in the quantity of money in circulation so long as such money is desired [Rueff 1949: vol. 3: 4–5].¹

If the price mechanism is reasonably free and the factors of production are reasonably mobile, Rueff's axiom, or equation of

¹Rueff's equations were put in more familiar modern form in Mueller (1991:17–27; 2010: 341ff).

exchange, best describes what actually happens in a dynamic free market of ubiquitous monetary exchange. Rueff demonstrated that in a free economy Say's Law does tend to operate—namely, that the total value of supply tends to equal the total value of demand—provided the market for cash balances tends toward equilibrium, thus ruling out sustained inflation and deflation. Rueff emphasized that it is the difference between the variations of the quantity of money and the demand for cash balances during each market period that renders Say's Law an imperfect, theoretical representation of a monetary economy. It must be said that Rueff's monetary theory and policy applies both to regimes of monetary convertibility, and to those which mimic them, as did the pre-Bretton Woods currency systems, reserve currency systems themselves, as well as the post-Bretton Woods dollar-based international monetary system. In each case, money might be brought into existence by the monetization of gold or an inconvertible financial claim (e.g., a U.S. Treasury security).

In a reserve currency system “high-powered” money must include both domestic and foreign official monetary liabilities. This broadening of the monetary base modifies Rueff's equations regarding the supply and demand for money, as Mueller (1991, 2010) has pointed out. To explain inflation in dollar terms, we need to include the increase in foreign official dollar reserves because this represents an excess supply of money, which is prevented by foreign central-bank intervention from leaving the dollar market.

In equation 4, the change in official dollar reserves (dR_s) is “excess money,” equivalent in its effect to an undesired increase in the money supply (M):

$$(4) D - Q = dP = dM - dL + dR_s.$$

The domestic monetary base ($M0$) plus foreign dollar reserves (R_s) equals what Mueller and I have called the World Dollar Base ($\$M_w$). So in Rueff's balance between total supply and total demand we replace dM with $d\$M_w$:

$$(5) D - Q = dP = d\$M_w - dL.$$

But Rueff's theory suggests that empirically sound monetary analysis must speak also when necessary of the World Euro Base, World Peso Base, etc.

The Case for Gold

It should be said that modern monetary policy ignores Rueff's fundamental propositions—the result being, as the evidence shows, one century of financial disorder that every careful student may judge for himself. For example, it was conventional wisdom of the monetarists, led by Milton Friedman, to presume that they could regulate inflation, the growth of the economy, the monetary base, or the total quantity of money in circulation through a so-called money stock rule—by manipulating central bank open market operations such that the money stock or the monetary base would grow, say 3 percent annually. In practice, the evidence presented at this conference shows that the Federal Reserve has failed—only one salient example being the disastrous episode of 1979–82. With remarkable humility, Friedman gave his considered, final judgment on the issue in a *Financial Times* interview (London 2003): “The use of the quantity of money as a target has not been a success.” However, Friedman's nemesis, the neo-Keynesian revival, despite its abject failure in the 1960s and 1970s, has now mutated into the combination of unrestrained fiscal policy, budget deficits, and unprecedented quantitative easing in order to finance government spending and the mortgage industry, debilitated as it is by government control.

So we ask, in the light of the Fed's failure, is there a better way, grounded in the evidence of monetary history? There is, of course, an available and an availing historic monetary regime—the classical gold standard—that has been tested for centuries in the market place. The essential, institutional mechanism of the classical gold standard is to define a unit of money (the monetary standard) equal to a weight unit of gold. Two of the many merits of such a monetary standard, in virtue of convertibility and the market mechanisms it sets in motion, are to regulate and to limit irresponsible central bank and commercial bank discretion, such that the monetary standard and price level may be reasonably stable over the long run.² Or in the alternative, one could establish and maintain currency convertibility to gold in a regime of free banking with no central bank. Here, it must be added that free financial markets are inherently stable—provided the indispensable free market institution of bankruptcy is fully effective, banking-system discretion is limited by the rule of

²On the case for gold, see Lehrman (2012, 2013) and Paul and Lehrman (1982).

currency convertibility to gold, and official reserve currencies are ruled out.

But academics have argued for more than a century that the gold standard, though a proven, long-run price level stabilizer, absorbs too much real resources in the process of gold production and is therefore, in economic and social terms, too costly. This is a false proposition. Milton Friedman (1960) estimated the resource cost of a gold standard to be about 2.5 percent of national income, whereas subsequent detailed analysis by Lawrence H. White (1999: 48) suggests much less, probably closer to 0.025 percent. This discrepancy was apparently caused by the rapid growth of gold money provided by private dishoarding in a stable monetary system and, as White notes, by the market-based conservation of the gold monetary standard through fractional reserve banking (Friedman assumed a 100 percent gold-backed currency).

As any active, financial market participant learns the hard way, such a *de minimis* cost of a reliable monetary standard would be but a minor fraction of the immense transaction and uncertainty costs borne by the manipulated, volatile, floating exchange rate system of more than four decades. Despite all denials, the competitive currency depreciations characteristic of today's floating exchange rate system are, without a doubt, designed to transfer unemployment to one's neighbor and, by means of an undervalued currency and customs regulations, to gain share of market in manufactured, labor-intensive, value-added, world traded goods. If these competitive depreciations and undervalued pegged currencies are sustained, floating exchange rates, combined with the twin budget and balance-of-payments deficits will, at regular intervals, blow up the world trading system.

This is so partly because the American budget deficits and balance-of-payments deficits were—and still are—almost automatically financed by new money and credit issued by the Federal Reserve, by the global banking system, and by the perverse mechanisms of the reserve-currency regime based on the dollar. These *de facto* U.S. government credit cards supply money and credit without limit to the U.S. government, thus jamming the balance-of-payments adjustment mechanism, as dollar balances accumulate in the official reserves of foreign monetary authorities. These dollar reserves, held in the trillions by foreign monetary authorities, are not inert. They are immediately reinvested, directly or indirectly, in the dollar market for

U.S. securities, financing the growth of government. Moreover, from 2000 until the financial crisis in 2008, foreign dollar reserves were increasingly invested in higher yielding federal agency securities thereby directly financing the housing bubble.

Under the classical gold standard, market mechanisms sustained the effective balance-of-payments adjustment mechanism and global rebalancing. In an imperfect world, peopled by imperfect men and women, the classical or true gold standard—without official reserve currencies—is the least imperfect monetary regime of history. Proven in practice, mutual convertibility of major currencies to gold (i.e., a common global monetary standard) established a coherent, equitable, trustworthy monetary regime by which to mitigate the curse of financial bubbles and currency wars. It was a regime designed by subtle and supple market-based rules to bring about global trade and financial rebalancing and sustain a reasonably stable price level over the long run—such a stable, global monetary order being based on stable exchange rates. The extraordinary economic outcome was the end of the perennial Malthusian era and the onset of steady, long-term economic growth.

Thus, do I argue that by means of the restoration of the true gold standard among the key currency areas, rapid economic growth would resume worldwide—and be sustained. Many gold standard restorations of the past, even in the most dilapidated conditions of inflation, deflation, and depression, have led to robust economic growth—the chronicles of which led to a Nobel Prize for Thomas Sargent in 2011. For establishment economists now to say that such a restoration is politically impossible is to venture into political forecasting—a doubtful enterprise, given their dismal record of economic forecasting.

Historical precedent suggests that after restoration of convertibility, inflation-hedging in unproductive assets would diminish. Anticipating a stable monetary order and a stable general price level, trillions of immense new savings would be channeled by market participants out of global financial arbitrage, speculation, and inflation hedges, into long-term capital markets—there seeking real returns from increased long-term investment in human and fixed capital. Increased savings from income, secured against inflation, would surely augment the flood-tide of investment. Such an outpouring of capital into productive investment must necessarily remobilize sustained demand for unemployed labor at rising real wages in order to work the new and more productive plant and equipment. Indeed,

under the true gold standard, the global economy, as a whole, may even attain balance-of-payments surplus—equal to the increase in official, monetary gold reserves—and thus attain once again the much sought-after global rebalancing; in this case, vis-à-vis worldwide gold producers and dishoarding.

Conclusion

Historical evidence has pronounced its judgment upon the Federal Reserve System—the institution into whose hands Congress entrusted the fiduciary responsibilities of a great nation's monetary standard, and of its monetary and banking institutions. Let it be said, however, that the men and women of the Federal Reserve System have presided with good intentions. But those intentions beg the issue. No observation could illustrate more decisively the most fundamental of American propositions: that ours is a nation of laws, not of men endowed with good intentions and unlimited discretion to rule over us without our consent. American history reminds us that the solution to the problem of unrestrained central banking lies with the unique power given to Congress under the Constitution (Article I, Section 8) to regulate the value of money and establish the monetary standard, and thus to undertake monetary reform.

I do not underestimate the level of statesmanship required to undertake monetary reform. But we must never forget that it is the constitutional right—and duty—of Congress to ensure sound money. The many failures of central banking, the Fed's increasing power and privileges acquired during the recent financial crisis, and the detrimental effects of a pure fiat money regime need to be remedied. We have now experienced the defects of one century of American central banking—and the predatory consequences of almost one-half century of American inconvertible paper money.

Under these circumstances, surely we must give thanks for the statesmanship of Rep. Kevin Brady (R-TX), chairman of the Joint Economic Committee, for sponsoring the Centennial Monetary Commission Act of 2013, which aims to study the Federal Reserve System in order wisely to reform it.

America has never yet failed to restore itself. At this centenary of the Federal Reserve Act, I must believe we do have it within our poor powers to restore a monetary system worthy of a great people, a great nation, and a peerless Constitution.

References

- Fisher, I. (1911) *The Purchasing Power of Money*. New York: Macmillan.
- Friedman, M. (1960) *A Program for Monetary Stability*. New York: Fordham University Press.
- Friedman, M., and Schwartz, A. J. (1963) *A Monetary History of the United States, 1867–1960*. Princeton, N.J.: Princeton University Press for the National Bureau of Economic Research.
- Keynes, J. M. (1913) *Indian Currency and Finance*. London: Macmillan.
- _____ ([1936] 1965) *The General Theory of Employment, Interest, and Money*. New York: Harcourt, Brace & World.
- Lehrman, L. E. (2012) *The True Gold Standard*. 2nd ed. Greenville, N.Y.: TLI Books.
- _____ (2013) *Money, Gold, and History*. Greenville, N.Y.: TLI Books.
- London, S. (2003) “Lunch with the FT: Milton Friedman.” *Financial Times* (7 June).
- Mueller, J. (1991) “The Rueffian Synthesis.” The LBMC Report (June/July). Arlington, Va. Serialized in 2013 at www.thegoldstandardnow.org/the-rueffian-synthesis.
- _____ (2010) *Redeeming Economics: Rediscovering the Missing Element*. Wilmington, Del.: ISI Books.
- Paul, R., and Lehrman, L. E. (1982) *The Case for Gold*. Washington: Cato Institute.
- Rueff, J. ([1927] 1979) *Theorie des Phenomenes Monetaires*. Paris: Payot. Republished for The Lehrman Institute. Paris: PLON.
- _____ ([1932] 1964) “The Case for the Gold Standard.” Lecture delivered at L’Ecole des Sciences Politique, March 17. Translated into English and reprinted in Rueff (1964: 30–61).
- _____ ([1945] 1981) *L’Ordre Social [Social Order]*. Paris: PLON for The Lehrman Institute.
- _____ (1947) “The Fallacies of Lord Keynes’ General Theory.” *Quarterly Journal of Economics* 63 (5): 343–67.
- _____ (1949) “Sur la theorie quantitative et le phenomene de regulation monetaire” (“The Quantity Theory and the Regulation of Money”) *Econometrica* 17 (July): 295–306. Unpublished Lehrman Institute translation, III/1–4a.

- _____ ([1955] 1967) "Un instrument d'analyse economique: la theories des vraies et des faux droits." In E. M. Claassen (ed.) *les Fondements Philosophiques des Systemes Economiques*. Paris: Payot.
- _____ (1964) *The Age of Inflation*. Translated by A. H. Meeus and F. G. Clarke. Chicago: Gateway Editions, Henry Regnery Company.
- White, L. H. (1999) *The Theory of Monetary Institutions*. Malden, Mass.: Blackwell.