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Source: American Journal of Agricultural Economics, Dec., 1968, Vol. 50, No. 5, Proceedings Issue (Dec., 1968), pp. 1123-1134

Published by: Oxford University Press on behalf of the Agricultural & Applied Economics Association

Stable URL: https://www.jstor.org/stable/1237298

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The Collapse of the Gold Exchange Standard

ROBERT A. MUNDELL

I CAN think of few places in the world where the subject of my remarks would appear to have less relevance. The "Big Sky" country reminds one of the vast continental dimensions of the United States and how closed the United States economy really is compared to other countries, except for Russia and China. At Billings airport there is a prominently displayed quotation by Herbert Hoover which says that the metal resources of Montana exceed those of all the known resources in the Soviet Union. If that were true (and I very much doubt it!) Montana itself would have to be a very open economy in order to profit from them. One can easily imagine the problems this state would have if the financial apparatus in the United States broke down. But the position of Montana vis-à-vis the United States is not very different from that of many nations in the world confronted with the threat of international financial breakdown. So, on second thought, Montana is not such an impossible place to speak about international monetary disorder.

The Exchange Market Collapse

The financial problems with which the world economy is confronted have their roots in obsolete intellectual attitudes. When change outpaces understanding, we become the victims rather than the masters of governing historical forces and get inveigled into wrong interpretation and prognosis. It is to improve such interpretations that this paper is devoted.

Only a couple of years ago the world monetary system looked very different from the way it appears today. This is because of the devaluation of sterling and the breakdown of the gold exchange standard in the form we used to know it. But the real problems of the system have not changed as much as they appear. Had you asked central bankers in 1966 to specify the major problems facing the world monetary system they would probably have said: Restoring the strength of the pound and the dollar, which means ensuring the ability of Britain to maintain her exchange rate and of the United States to continue convertibility of the dollar into gold at \$35 an ounce. And had you asked, How should Britain and the United States go about this? they would have answered: By correcting their balances of payments through less inflationary policies or whatever other means were available. But they would say something similar today, although it would be tempered by greater caution and less dogma.

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Only a year ago events had altered attitudes. The United States had braked the inflationary boom of 1965-66 by dear money; this occurred between June and November 1966. Soon after, interest rates fell and the Federal Reserve was faced with the threat of recession. The U.S. authorities reversed policies and expanded, a move which coincided both with the needs of the U.S. economy and with the recessions in Germany and France. The U.S. monetary ease was bad for her balance of payments but good for the United States and the world economy. Criticism of U.S. inflationary policy was much more muted in 1967, and the time became ripe for reform.

On March 17, 1967, Secretary Fowler issued at Pebble Beach, California, what was widely interpreted as an ultimatum to the Group of Ten to create a substitute for the dollar in the form of a new international reserve or else face the prospect of a reconsideration of the U.S. commitment to her current gold policy. The London agreements reached at the end of August 1967 owed much to the hard intellectual work of the Group of Ten, but their timing was hastened by pressure from the U.S. Treasury. The outcome was an agreement to propose at the IMF Governor's Conference later in September a new international asset called "special drawing rights." The barbaric name for them was due to the need to compromise between the French officials, who considered them as a credit instrument, and the U.S. officials, who considered them money.

Official reaction to the agreement was enthusiastic. It was heralded at the time as a "milestone in international monetary cooperation," "the most important step since Bretton Woods," and other wildly enthusiastic examples of oversalesmanship. This was to be expected, since the agreement was the outcome of official policy. The general reaction of economists was much less exuberant, and a few economists, including myself, and perhaps Sir Roy Harrod, regarded these drawing rights as positively harmful. One argument was that they would distract attention from the more fundamental problems facing the world system and that, although their longrun potential was substantial, the major hurdle was to get beyond the immediate short run. Solution of the short-run problem would involve substantial changes in the structure of the system, and the long-run creation of a new international money should be integrated into or evolve out of this short-run reconstruction of the system.

The official answer to this was that the public should not expect the SDR's to perform a function they were not intended to perform and that the planting of a seed today would generate greater confidence in the stability of the system: the SDR's could, indeed, be used as a substitute for gold and thus reduce the speculative demand for it.

The IMF Rio meetings (September 1967) reflected the optimism of the U.S. Treasury and the euphoria generated by belief in the gigantic new

step that the birth of the infant SDR's was expected to involve. It was, indeed, a remarkable event, with the leaders of the financial world assembled and engaging in mutual criticism and self-criticism of one another's economic policies. It was a development no one could have conceived of 30 years ago, and even 10 years ago the attitude would have been far different.

Nevertheless, despite the excitement of a great new experiment, there was a cloud overhanging the meeting. The plight of sterling was a great unspoken issue. It was common knowledge that the Bank of England had accumulated massive short-term debts and assumed substantial commitments in the forward market, although not many could form an accurate assessment of their size. The questions facing British authorities (and the other central banks) were (a) Can Britain hold the sterling rate? (b) Should Britain hold the sterling rate? (c) Will Britain hold the sterling rate? and (d) What, if any, international steps can or should other members of the Group of Ten or the Fund take to assist Britain, either by consolidating her debts through a long-term loan or by placing them in an international account?

These questions were all resolved in the third week in November. By Tuesday night the British had apparently decided upon devaluation and dutifully notified a restricted group of the international community. Internal activity immediately began on the exchange markets, leading to rumors of a leak, and by Friday Britain had lost vast sums, forcing the market to close before normal closing hours. The rate change was announced over the weekend, a devaluation of 14.3 percent (from \$2.80 to \$2.40). In the wake of sterling devaluation, most of the sterling area countries followed, although this was much smaller than it was in 1949.

Australia, significantly enough, did not devalue. She was looked upon as a key country from the standpoint of preventing a proliferation of devaluation. A phone call from the U. S. President to the Australian Prime Minister made clear her importance; in particular, the United States was afraid that devaluation by the Australians might be the straw that broke the camel's back. For example, it might prompt devaluation of the Japanese yen, which in turn would influence rate decisions by Canada, France, and other countries. Australia was the marginal country.

Just another devaluation? Hardly. It coincided with the British decision to dismantle military positions east of Suez, so historians, with their fondness for dates, might well pick November 18 as the most convenient date to set for the fall of the British Empire, as they picked the Treaty of Adrianople (378) for the fall of the Roman Empire.

Seriously, however, the British devaluation showed that coordinated action by a major currency, in a world in which at least one of the powers (France) is trying to rock the boat, is impossible. Britain had scrupu-

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lously abided by the rules of international commitments in her handling of the devaluation, but I very much doubt that the British would act so virtuously in a subsequent devaluation. Nor would France, Germany, or the United States. Virtue is too expensive! The next rate change may well be a unilateral move.

France bears some share of the blame for the embarrassment of the British authorities in November. In the year leading up to devaluation, the world could witness the unprecedented event of a major country calling openly for devaluation of the pound. This was part of a package deal necessary if France was to withdraw her veto of British membership in the Common Market.¹ The position of sterling might have been shaky enough in any event. The British had never made the major readjustment that was required to set sterling on a sound footing throughout the 1960's, and (at least this is my view) she still conducted her monetary policy as though she had a flexible exchange system [Robert A. Mundell, *International Economics*, New York, the Macmillan Company, 1968, Chap. 19]. But the French attack was, nonetheless, outrageous.

The cleaning-up process was (not unexpectedly) disorderly. In the aftermath, the United States lost hundreds of millions of gold. The last quarter's gold losses were so alarming that President Johnson felt compelled to pre-empt the bad announcement effect by introducing "strong measures to put the balance of payments in order," including special taxes on travel and further prohibitions on foreign investment.

The depressing aftermath is well known. A well-organized union of interests of France, South Africa, the gold lobby, and (so it was rumored) Russia, colluded to establish a bullish market for gold, both by stimulating private speculation and by an arrangement through which South Africa (and perhaps Russia) would withhold gold from the market. At the same time, discussion in the U.S. Senate about changing the U.S. commitment to gold created alarm abroad. The gold pool (which France had abandoned in June 1967) faced mounting losses. A run started and the gold drain reached crisis proportions by the third week in March, until, in a communiqué issued on March 18, the authorities announced that they would no longer supply the private market. Gold was to circulate among central banks at \$35 an ounce, but central banks were not to buy or sell in the private market.

Thus ended the Gold Exchange Standard, the system in force since 1934. The warning that Triffin had sounded back in 1959 had found its mark.

¹The other provisions were that Britain withdraw from positions east of Suez, that she abandon her Commonwealth connection, and that she give up her special relationship to the United States. As far as I am aware, Britain was to be allowed to keep her language.

The Struggle to Save the System

It is worth pausing a moment to reflect on this episode. Triffin had posed in 1959 the dilemma of the gold exchange standard: if the United States cured its balance of payments, the world would run short of liquidity, but if it did not cure its balance of payments, the gold exchange standard would break down. The seeds of destruction were contained within the system itself.

We have seen how Triffin's prediction was vindicated. It is really quite remarkable. For ten years, the U.S. Treasury and the IMF first denied the Triffin dilemma, then wrestled with it, and finally sought a way out of it. But the remorseless logic of the system did not pay any attention.

Think of it. There, on the one hand, is the evolutionary logic of the system intent on its inexorable suicide. Against it are arrayed the most capable forces in the financial chancelleries of the world, fighting against the tide.

It does not matter when we date the opening shot in the struggle. Eight years ago is as good a time as any. October 1960 was the month of the gold bubble, the pre-election month in which communications broke down between the Bank of England and the Federal Reserve System, and the price of gold shot up in London to \$40 an ounce. At that time the matter was settled when President-elect Kennedy gave his pledge that the dollar would not be devalued, a pledge that announced the opening of the Great Struggle.

The first real battle was waged a few months later. Speculative capital movements had aggravated bad policies in Britain and Germany; and in March 1961, the Germans raised the price of the mark by 5 percent. This took place while the governor of the Dutch Central Bank was in South Africa, and it created considerable confusion and delay until the Dutch followed the Bundesbank by raising the price of the florin. But the significant fact was that the up-valuation of two of the strongest currencies on the Continent brought speculative capital *to* Germany and Holland; it aggravated the speculative capital flow because the market thought up-valuation, if it were to take place at all, was inadequate. There was little point to such a small rate change; it only served to excite the market and remind the financial world that the exchange system is an adjustable peg system and not a fixed exchange system.

There followed, in the years 1960–1968, a number of fascinating battles fought to hold the system together. Notable crises concerned sterling in 1961, the Canadian dollar in 1962, the lire in 1963, sterling in 1964, 1965, 1966, and 1967, and the Canadian dollar in January 1968. There is currently going on, as you probably know, a battle to save the franc (or else prepare the franc for its devaluation), to strengthen the pound, and to weaken the mark.

It is more interesting, in any case, to sketch in perspective the elaborate system of defenses set up to protect the dollar. These were based, unfortunately, on two faulty principles: (a) that foreign aid should be based on balance-of-payments considerations and (b) that the balance of payments should be looked at piece by piece, not as an integral part of a general equilibrium system. These two principles are two major fallacies on which every beginning economics student has to cut his teeth. According to one, Portugal, Peru, and Thailand should provide foreign aid to the United States; the other leads to a game of musical chairs in which the plugging of one hole only pushes more gold out of the other. On the basis of these faulty principles, the U.S. authorities tied U.S. aid (1960), controlled the spending of troops in Europe, put a "temporary" tax on foreign securities (1963), put quotas on bank lending abroad (1965), and instituted a system of controls over direct foreign investment.

These measures did not correct the U.S. deficit, as theory suggests that they would not; they merely permitted a higher price level in the United States. They do, however, have real effects and help to accomplish other objectives. This raises the interesting sociological question as to whether the measures were *intended* to correct the U.S. deficit, or whether the deficit was only an excuse used to conceal their real purpose. Most of these measures turn out to have significant effects in improving the U.S. terms of trade on capital account.

Some support for this interpretation can be got from statements which President Kennedy apparently made to his economic advisers even before assuming the presidential duties. Early in his administration he had, furthermore, warned that, although the United States would work to correct the balance of payments, it would not use deflationary policy, impose controls on exchange, raise tariffs, or devalue the dollar—that is, it would not undertake any effective balance-of-payments policies!

International Remedies

With remedies at home ruled out, attention had to be directed to international solutions. By 1961 there developed an intensive movement toward monetary cooperation. The Roosa era began with U.S. activity in the foreign exchange markets, the introduction of foreign-currency-denominated dollar assets (Roosa bonds), and the beginning of discussion about the need for international monetary reform.

The two horns of the Triffin dilemma were now clearly visible. Continental Europe (especially France) grabbed hold of the one that said: Correct the U.S. deficit. The United States and Great Britain grabbed the other that said: Prevent the liquidity shortage that correction of the deficit would create. The Europeans said to the United States: If you correct the deficit, and then the need for liquidity is felt, we can then go ahead with reforms. But the United States responded that it was silly to correct the deficit before a substitute for the flow of liquidity it provided was found. A compromise was reached when it was agreed to work out a contingency plan if it became apparent that more liquidity would be needed.

But the U.S. authorities got the better of the argument as events turned out, not because their logic was better, but because they could not employ effective means of correcting the deficit.

Some hope had been placed in the monetary-fiscal policy mix after the tax reduction was put into effect in 1963-64. The economy accelerated, and the way was cleared for higher interest rates more in keeping with the needs of international equilibrium. But now the push was too far. With mounting defense expenditures due to the Viet Nam war, and aggravated pressure on the capital market, interest rates began to rise past levels tolerable to the Federal Reserve System, which then opened up with an acceleration of monetary expansion, nullifying the external benefits of the policy mix, apparently sacrificing both internal and external objectives as the United States moved from the unemployment-deficit phase to the inflation-deficit phase. Both fiscal and monetary restraint were now in order.

But there were other factors involved. The U.S. deficit has its counterpart in foreign surpluses. Foreign countries, with the possible exception of Germany, *wanted* surpluses and pursued policies to obtain them. As long as their policies succeeded, the United States could not correct the balance-of-payments deficit no matter what actions were taken. If U.S. monetary policy tightened, foreign monetary policies would tighten to protect their surpluses. It was becoming increasingly clear that the effect of U.S. monetary policy was *not* to correct the U.S. balance of payments, but to affect monetary policy all over the world.

Shades of the sterling standard! Recent studies had recognized that the credit policy of the Bank of England in the nineteenth century did not operate as the Cunliffe Committee report asserted it would, and that it was not a matter of deflating when there was a deficit and inflating when there was a surplus. Gold flows were rather directed toward Britain when there was a boom and away from Britain when there was a recession; and the policy of the Bank of England exerted its influence primarily on the money markets throughout the world. The new view of the nineteenth-century gold standard is that it was a system dominated by sterling and that domination was essential to the smooth operation of the system.

The New View of the System

This reinterpretation was of enormous importance, for if it applied to Britain in the nineteenth century, why should it not apply to the United States, the country that had replaced Britain as the center of the system, in the post-1945 system? If true, it meant that American financial policy,

instead of worrying about its gold stock or its balance of payments, over which other countries have primary control, should be addressed to the need for noninflationary, nonrecessive pressures in the world as a whole. The world, or at least the Atlantic countries, should be looked at as a single monetary system, and the U.S. Federal Reserve authorities should, in short, act as if the Federal Reserve were the world central bank that it was in fact becoming.

The U.S. deficit then acquired a quite different interpretation. It is not something to be corrected; it is rather a variable that determines the rate of expansion of foreign-held world money. Dollars are the world money, and they are held both by U.S. residents and by foreigners. The dollar supply then should be increased or reduced according to whether it is desirable to introduce monetary ease or tightness in the world economy. The deficit is merely that part of U.S. monetary expansion that the rest of the world uses to add to its reserves.

How large the deficit is is not within the control of the United States. The U.S. authorities determine the rate at which monetary liabilities of the Federal Reserve expand, but not that fraction of it that is taken up by central banks and commercial banks in the rest of the world.

Let us check this interpretation against the facts to see to what extent the United States was fulfilling the duties thrust upon her. In 1966 the world economy was inflating excessively. The Federal Reserve stepped on the brakes and reduced the rate of expansion of world money.

By December 1966, weaknesses had appeared in the world economy, and the Fed reversed its tight money policy. This reversal, although harmful to the U.S. balance of payments, was needed because the three largest economies, the United States, the United Kingdom, and Germany, showed signs of recessive tendencies, and France, whose current account balance had become unfavorable, was beginning to contract. Monetary ease was, therefore, the appropriate policy for the world economy and the Federal Reserve authorities "obliged." The system, by 1967, was now beginning, perhaps for the first time, to work well, looking at it in this new light. The Federal Reserve authorities showed signs, by their actions if not their words, that they were reacting to the signals.

For the monetary mechanism can, indeed, be looked on as an information system, supplying signals for policies. The signals from abroad came from the gold conversions. When a European country converts dollars into gold, it is telling the United States, "It is in our interest if you contract." And when it converts gold into dollars, as France did last month, it is saying, "It is in our interest if you expand."

Of course, central bankers have not exactly looked upon the system in just this way. Their gold-dollar policies may appear to be motivated by entirely different considerations. Each central bank may be acting in its own selfish interest, while still fulfilling the hidden designs of the world system. These designs are, of course, not so hard to see as Adam Smith's invisible hand; they are more like Ariadne's thread!

What concerns us, however, is the transition from one system to another and the subtle revision of thinking about world monetary policy in the transition phase.

With hardly anybody noticing it, the gold exchange standard in its old form was dead, and the dollar exchange standard had taken its place. All this occurred perhaps years before the formal breakdown of the old system. It was during 1966-67 that the Federal Reserve System completed a full cycle of tight money and easy money consistent with the requirements of the world economy.

I have now told you why I think that the system evolved as it did into a dollar-exchange standard, a system in which the United States took on a new role and began to adapt its policies to the role of world banker, not just as a key currency center, not just as the provider of a reserve money and the intervention currency, but as a world banker in the more comprehensive sense of guiding the monetary policy of the world.

The French Attack

It is in this light, I submit, that we have to see the devaluation of the pound, the abandonment of the private gold market, and the situation we now face. More particularly, it is in this light that we have to see the awkward and apparently intransigent policies of the French government.

France was responsible, in part, for the weakness of sterling and the run on gold in February and March of this year. It is my view that these policies were not the consequence of French ignorance of the way the system had begun to work; it was rather that the French authorities understood it before anyone else! They anticipated what was going to happen, didn't like what they saw, and attempted to change it.

Every economic system evolves to create a dominant money asset. Concede me the point if you will, although I could easily develop the theoretical case for it if I had more time. Then it is clear that for the French to resist the evolution to a dollar standard, they have to find an alternative. A common European currency was not yet in existence, so gold was the only contender, and so it was to gold that the French government had to turn. If the wings of the dollar were to be clipped, it was necessary to build up gold. That was the intention of M. Giscard d'Estaing when he was Minister of Finance, and his policy was backed by de Gaulle and further implemented by d'Estaing's successors.

Now we could go on to develop a plot here. To weaken the dollar, it would at first be convenient to weaken sterling, for the dollar would be hurt by a substantial devaluation of sterling. This is consistent with the

open advocacy of sterling devaluation by France in the months preceding November 1967. But I don't want to go too far and attribute entirely malicious motives to the French. There were other reasons besides. I take at its face value the French refusal to come to British aid in 1966 and 1967, at a time when the other members of the Group of Ten were helping sterling. The French were right. Further assistance to Britain was not only not in the Continent's interest, it was not even in the British interest. The British merely piled up more debts and had to devalue anyway. The French were right on this point, and the other members of the Group of Ten were wrong. This much, I believe, should be frankly conceded.

The British devaluation, if it should have been contemplated at all, was insufficient. From the point of view of the trade balance, it was more than adequate; but it did not make the necessary allowance for the confidence factor when a reserve currency devalues. Because it was insufficient to restore confidence, it weakened sterling as a reserve currency without restoring equilibrium in the British balance of payments. The British devaluation was (a) more than adequate from the standpoint of improving the flow of the U.K. balance of trade, (b) grossly inadequate from the standpoint of restoring confidence in sterling, but (c) just right from the standpoint of a straddling action that would be consistent with preserving the strength of the dollar.

But the French did achieve their aim of weakening sterling as a reserve currency.

The next step was to weaken the dollar by strengthening gold.

In the gold crisis of March 1968, there was considerable speculation that the United States might close off supplies to the London market and might even raise the price of gold. (This would involve the clause in the Fund dealing with a uniform reduction in the par value of all currencies. For the United States to consent requires an act of Congress, but it is not out of the question that Congress could act quickly if it were pressed to do so.)

But the gold forces underestimated the resolve of the U.S. Treasury and the other members of the Group of Ten to hold the official price. They adopted Governor Carli's plan for a two-tier system. The crucial provisions of this plan are that the central banks would not buy nor sell gold in the private market. (It is hoped that, at the IMF governors' meeting next month, this agreement will be generalized beyond those countries that signed the Washington communiqué.)

When we look at events in this way, we arrive at a somewhat different interpretation of the sterling and gold crises. The formal breakdown of the system was not the important thing. It merely recognized fundamental changes that had already taken place. It was a palace insurrection. The revolution had already been won. The system would not collapse with the increase in the price of gold because it had already evolved into a new system over a year earlier. Fear of the consequences of the change in the gold market for the system were misplaced. For now, in August 1968, the cards are on the table for all to see. An ounce of gold is worth about \$40 in the private market—provided that South African supplies are kept away from the market. Everybody knows that the price will go down when South African sales are resumed in full force, bearing in mind that there are perhaps about 18,000 tons of gold in liquid hoards in private hands. What holds the price where it is is the gamble that the monetary authorities may yet raise the price; hope springs eternal.

Where We Now Stand

The monetary facts, however, are that the world has virtually moved onto a dollar standard. Of course the United States may claim that it buys and sells gold freely; but everybody knows that it does not. The dollar has become effectively inconvertible into gold, even for foreign central banks. All the big central banks know that if they try to cash dollars for gold in large amounts, the United States will simply stop selling it.

This means that other countries have to hold dollars or adjust. Their only alternative is to eliminate their balance-of-payments surpluses. But if they want surpluses because they want their external reserves to grow, they have to hold dollars or a new international asset.

One might ask, however, Does not the higher price of gold symbolize the weakness of the dollar, rather than its strength?

The answer is a paradoxical one: Yes, but weakness is an essential attribute of an international money.

Gresham's Law states that bad money drives out good—if they both exchange for the same price. If gold is worth more as a commodity than as a money, it will not be used as a money.

If a central banker knew that he could always get \$40 for an ounce of gold, he would never settle a monetary transaction with gold valued in official stocks at \$35 an ounce. This means that if gold were always worth at least \$40 as a commodity, central bank holdings would become completely illiquid. To the extent that this is true—to the extent that gold on private markets *is* worth \$40—gold would cease to be an international monetary reserve. Usable reserve assets of the gold-holding central banks would be reduced to the dollar component of reserves.

It is on this basis that the two-tier system should *increase* the demand for dollars, which, to the extent that dollars are softer than gold, become the only usable reserve asset, as well as the only important international currency. The rise in the price of gold in the private market illiquifies or "demonetizes" it.

Now in fact this is an exaggeration. Gold is not really worth \$40 as a

commodity. Every central banker knows that if he dumps gold onto the private market to get dollars, the pride will go down—and fast. So the argument that I am making is only partly true. Some central banks will sell gold to others at \$35 an ounce, as France has been forced to do. To this extent, gold has not been completely demonetized.

The Future

Our system has now evolved, therefore, into a dollar standard, for good or bad. This system has some great advantages, but I would not want to claim that it is an ideal system, nor that it is permanent. Indeed, there are strong objections to it, from an international point of view, on both political and social grounds. Even in the United States there are objections to the system. Some of these objections are very strong indeed. But the question lies with alternatives. There are very few open.

Let me close by listing some of the major alternatives. I believe the basic ones to be (a) adoption of the gold standard, (b) introduction of a system of flexible exchange rates, (c) a return to the gold exchange standard by raising the price of gold, (d) a new world currency.

A discussion of the merits of these systems lies far beyond my theme today. Let it suffice for me to say that I do not regard a or b as feasible, and although c is intellectually respectable and institutionally stable, it is very expensive. The plan for a new world currency on the other hand is no longer far-fetched. It is more practical than the alternatives, and I consider it within our grasp, perhaps within the next decade or even sooner.