

International Liquidity: Are the Supply and Composition Appropriate?

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I. Introduction

The conference whose fortieth anniversary we are here to commemorate omitted to create a fiduciary reserve asset as desired by Keynes, but instead gave its blessing to the gold exchange standard inherited from the interwar years. The members of the Fund subsequently repaired the omission of Bretton Woods by creating the Special Drawing Right (SDR), and then allowed the gold exchange standard to lapse. But this has not led the world into a system even remotely resembling the well-ordered vision of which Keynes dreamed. The question posed to me today is whether the arrangements that have evolved instead—which some of us have referred to as a “non-system”—serve the world well.

The paper is organized as follows. The next section deals with semantic and measurement problems, regarding “international liquidity” and the notion of “appropriateness.” This is followed by a sketch of the evolution of reserve arrangements and of perceptions of the issues involved from the time of Bretton Woods to the present day. Section IV discusses the current adequacy of reserve supply, and Section V the appropriateness of the present composition of reserves. The final section considers proposals for change.

II. Concepts and Measurement

The term “international liquidity” has for some years been used as a synonym for “international reserves,” rather than defined in functional terms as a measure of a country’s ability to finance a payments deficit and avoid resort to adjustment measures. Despite my own former sympathy for the functional approach (Williamson 1973, pp. 687–88), I shall abide by conventional practice.

“International reserves” were defined by the Ossola Report as “those assets of [a country’s] monetary authorities that can be used, directly or through assured convertibility into other assets, to support its rate of exchange when its external payments are in deficit” (Group of Ten 1965, p. 21). This definition suggests that liquid foreign exchange holdings of central banks, SDRs, and reserve positions in the Fund should certainly be included in reserves. European Currency Units (ECUs) held by members of the European Monetary System (EMS) are more ambiguous, since they can be used only for financing deficits incurred with other members of the EMS. The traditional reserve asset, gold, is an even more doubtful candidate.

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Gold is not in practice used in intervention to support exchange rates in times of deficit. It is not routinely exchanged into currencies for that purpose, as SDRs are, perhaps because its enormous price fluctuations would expose to criticism central bankers who sold before a price rise (or bought before a price fall). To the extent that "assured convertibility into other assets" implies conversion at an assured rate (and this was considered the essence of convertibility in the 1920s), it clearly does not qualify as a reserve asset by the traditional definition. The IMF has recognized the dubious nature of gold's claim to continued classification as a reserve asset by creating a concept of total liquid reserves, rather inelegantly labeled "total reserves minus gold," which excludes gold altogether; and this is the concept on which most calculations of reserve adequacy are now based.

On the other hand, it seems paradoxical to many that the traditional reserve asset, still held by central banks in large volume,¹ should be excluded from the measure of reserves. The volatility of the gold price undoubtedly detracts from its liquidity. The fear of depressing the price against themselves may act as an added deterrent to substantial sales by large holders. On the other hand, gold can be used as collateral rather than sold outright. The fact is that gold is an element of national wealth held by central banks that can be—and occasionally is—mobilized to meet an external crisis.

This is perhaps a topic where an empirical study could hope to clarify whether gold still merits classification as a reserve asset. There are, after all, a number of estimates of the demand for reserves which have found a significant explanatory role for most of the variables that theory would suggest to be relevant (see, for example, Edwards 1983, Frenkel 1983, von Furstenberg 1982, and Section II.1 of Williamson 1973 for a survey of an earlier generation of such studies). Similarly, it has proved possible to detect a systematic effect of reserve levels on adjustment policies. If such studies yield markedly better results for nongold reserves than for total reserves including gold, as I would conjecture, we will surely be able to conclude that the time for completing the statistical demonetization of gold has arrived. Until then, the value that is placed on gold holdings in measuring reserves is uncomfortably arbitrary.

ECUs also present a major problem of measurement. They are created by member countries of the EMS depositing 20 percent of their holdings of both gold and dollars in the European Monetary Cooperation Fund (EMCF) in exchange for an equivalent quantity of ECUs that may then be used in settling intra-EMS interventions. However, ECUs are created not by a permanent deposit with the EMCF, but by a series of three-month swaps. Each swap is unwound with no impact on the net worth of the central banks involved, irrespective of whether or not they have drawn on their ECU balances. The sole role of the gold and dollars deposited in the EMCF is to determine entitlements to receive ECUs. Under these circumstances the most appropriate way to measure reserves is to adjust the published reserve statistics to show the gold and dollar holdings nominally deposited with the EMCF as if they remained in national possession, and not to include the holdings of

¹Gold holdings are, however, highly concentrated; six countries account for over two-thirds of the total.

ECUs. This adjustment has sometimes been made by the IMF in its *Annual Report*.

Even this expedient is not entirely satisfactory. Since intra-EMS imbalances are financed by swaps, the transfer of ECUs, and lending by the EMCF, reserves as measured above underestimate the sums available to members of the EMS for certain purposes. A suitable adjustment can be made where the reserves/imports ratio is being used to appraise reserve adequacy, however, by combining the measure of reserves proposed above with a measure of trade that excludes intra-EMS trade.

The problem with measuring foreign exchange reserves is quite different from that of measuring the value of gold and ECU holdings. There is no question that liquid foreign exchange holdings qualify as reserve assets, and no doubt about their appropriate valuation. The problems arise, rather, because a number of countries have for some years engaged in window-dressing designed to conceal either the accumulation or loss of foreign exchange reserves. The main underreporters are the capital-surplus oil exporters, while the countries that exaggerate their currency reserves are usually those that wish they had more than they do. Several instances of such over-reporting have recently come to light, as detailed in Williamson 1984 (pp. 17-18). In that study I concluded that the reserves of the capital-importing developing countries were almost certainly exaggerated by at least SDR 10 billion (almost 10 percent) in mid-1983, and perhaps by much more.

In order to address the topic assigned to me, it is important not just to clarify what is understood by international liquidity but also what is meant by "appropriate." When they are being theoretically self-conscious, most economists claim to employ the concept of Pareto optimality in reaching such judgments. In the context of international relations it is natural to think of countries as the individual agents, and so one set of arrangements is judged Pareto preferable to another if at least one country can be made better off without worsening the position of any other. I suspect that this is pretty much the standard that the international community of sovereign states does in fact employ in seeking international agreements—which is why there have not been many such agreements of substance for some years.

In practice, applied economists escape from the hopeless indeterminacy of the Pareto criterion by asking whether there is a "general" gain, interpreted as a gain by some that outweighs the losses of others. The weighing of those gains and losses is customarily done by a simple monetary test, evaluating a dollar equally no matter to whom it accrues, which is semi-rationalized by Scitovsky's compensation principle. Those of us with egalitarian value systems are uneasy about this, and try to insist that at least some greater weight should be attached to changes in the income of the poor in evaluating whether a change is desirable. Hence in gauging whether present arrangements are appropriate I shall ask whether there would be a general gain in moving to a feasible alternative, and in particular whether there is reason to think that the developing countries would gain by the change.

III. Historical Background

As is well known, Keynes failed to persuade the U.S. Treasury of the virtues of his visionary proposal for creating a new international reserve asset (bancor) and endowing countries with large overdraft rights in an International Clearing Union. Instead, the White Plan for retaining the gold exchange standard and supplementing it with a modest Stabilization Fund provided the basis of the Bretton Woods system.

A gold exchange standard, like a simple gold standard, is supposed to ensure that the monetary expansion each country can afford (given the obligation of maintaining a fixed exchange rate), and therefore the level of world nominal income, will be governed by the available gold stock. The reserve center can to some extent finance its deficits by liability financing, thus supplementing the world monetary base provided by the gold stock with a certain sum of reserve currency, but this process must be limited if the gold exchange standard is to survive. Supplementation of gold by a reserve currency permits a larger nominal income to be based on a given gold stock, but an increase in the stock of gold is still expected ultimately to generate a proportionate increase in nominal income (what I once termed the "international quantity theory," see Williamson 1973).

In fact economic policy in the postwar years was not conducted even approximately in accord with these rules of the gold exchange standard. This was the height of the Keynesian Era, when countries aimed at "full employment" or "internal balance," and treated reserves as a buffer stock which enabled them to combine their dominant (domestic) objective with temporary departures from external balance. The rate of inflation was (especially for the United States) whatever was judged (or misjudged) to be internally optimal, as reflected in the internal balance target pursued, rather than anything dictated by the supply of gold.

Robert Triffin, who in 1947 pioneered the buffer-stock as opposed to monetary-base theory of reserves, was also the first to recognize its implications for the nonviability of the Bretton Woods system. For a time the reserve center can sidestep the threat posed by a growth of gold stocks less than the growth in the demand for reserves by issuing its own liabilities, but eventually this will inevitably undermine the credibility of the commitment to gold convertibility. Hence the Triffin Dilemma: either the United States would correct its payments deficit and confront the world with a liquidity squeeze that would imperil real growth, or the deficit would continue and undermine confidence in the dollar price of gold. This analysis inspired the negotiations that led in 1969 to creation of the SDR, thus repairing the great omission of Bretton Woods.

By 1969, however, the world was no longer on a gold exchange standard. To prevent a confidence crisis developing until a reserve asset to supplement gold had been created, countries had increasingly refrained from exercising their rights to convert dollars into gold. After introduction of a two-tier gold market in 1968, it was generally understood that any major exercise of the ostensible option of converting dollars into gold would precipitate a closing of the gold window. The new U.S. administration indicated its sympathy for

“benign neglect.” The world was on a *de facto* dollar standard.

Under a full-fledged dollar standard with permanently fixed exchange rates, the pace of world monetary expansion would be determined by the decisions of the Federal Reserve Board. But in fact exchange rates could change under the Bretton Woods system, and thus one cannot take it for granted that the other countries were reduced to monetary dependence on the United States. Indeed, the United States came to view the key feature of the *de facto* dollar standard as something quite different, namely, the nth currency role of the dollar which allowed other countries to choose their exchange rates and hence their balance of payments outcomes. The U.S. balance of payments deficit was viewed as the residual which allowed other countries to build up the reserves they wished to hold for buffer-stock purposes.

In retrospect it seems difficult to doubt that both views had an element of truth. The U.S. monetary expansion of the early 1970s was transmitted abroad by the attempt to preserve the system of pegged exchange rates, as under a dollar standard. But other countries did have the ability to adjust their balance of payments position in ways other than by playing the gold standard rules of the game, and those policy instruments were used in the attempt to combine internal balance with a desired rate of reserve accumulation.

Both views recognized that the United States occupied a highly asymmetrical position in the system, and both sides found the asymmetries on which they focused their attention irksome. It is a matter of history that the party which finally ended the fiction of the gold exchange standard was the United States, and a matter of speculation as to whether the Europeans would have chosen to break away from the *de facto* dollar standard had the formal gold exchange standard been terminated less provocatively.

The closing of the gold window in 1971 set in train a series of negotiations in the Committee of Twenty which it was hoped would establish a new monetary order free of the asymmetries that had been perceived to be so irksome in the past. The Europeans wanted asset settlement to complement the SDR agreement, so as to make the rate of SDR creation the basic determinant of world reserve growth (and therefore, according to the monetary-base view of reserves, of world monetary growth). The United States wanted a reserve indicator system, to remedy the asymmetry in exchange rate determination. For some reason that I could never understand these two ideas were perceived to be in conflict, while the necessity of limited exchange rate flexibility in permitting managed crisis-free adjustment was not acknowledged. Increasing monetary nationalism, plus the intellectual fashion for ascribing miraculous stabilizing powers to steady growth of some domestic monetary aggregate, ensured that the negotiations ended in abject failure (Williamson 1982a). The alternative that emerged was generalized floating and a multiple reserve currency system.

From the standpoint of the monetary-base view of reserves, the crucial characteristic of floating is that it devolves the determination of monetary policy to individual nations: the reserve stock no longer has any role in gov-

erning the growth of nominal income. According to the buffer-stock view of reserves, the move to floating is a good deal less basic: it merely reduces the constraints on countries being able to achieve the reserve stock they desire. (It need not necessarily reduce the desired level of reserves: as Harrod (1965) once argued and Black (1983) has recently shown formally, it is conceivable that countries would be moved to hold larger reserves under floating because of the greater uncertainty.)

But the move to generalized floating was only one of two developments that transformed thinking about the reserve system in the 1970s. The other was the emergence of an international capital market. By the mid-1970s, most countries, with the exception of the least developed, were able to satisfy their liquidity needs from the liability side of the balance sheet, so that the external constraint on policy shifted from liquidity to creditworthiness. The increase in the supply of dollar reserves ceased to bear any relationship to any concept of the U.S. balance of payments. Reserve supply became endogenous.

The consequences of these developments were important. There is fairly general agreement that they have served to erode what remained of the monetary-base theory of the demand for reserves.² For a decade or so they permitted the world economy to expand with less concern for external constraints than in any previous historical period, despite the coincidence of the OPEC surplus and its counterpart, abnormally large deficits in the rest of the world. Paradoxically, the countries most limited by the external constraint were not the middle income countries that built up the proportionately largest net debtor positions (although Peru and Turkey both confronted the creditworthiness constraint relatively early), but industrial countries (notably Britain and Italy, and subsequently France). The explanation is presumably that the industrial countries contracted foreign debt denominated in their own currencies rather than in foreign exchange, so that a withdrawal of funds brought the external constraint into play as soon as asset holders started to doubt the determination to resist partial expropriation through inflation. The overt repudiation needed to expropriate creditors when debt is denominated in someone else's currency is a far more traumatic—and therefore less likely—step, so what we now call the Debt Crisis did not break until 1982. In that year most nonindustrial countries, with the exception of the capital-surplus oil exporters, discovered that they had reached the creditworthiness constraint. Since then they have reverted to being liquidity constrained.

The preceding account has not attached much importance to the distinction between reserve centers and other countries. The greater is capital mobility in general, the less significant is the ability to attract short-term deposits of foreign monetary authorities. A much more critical distinction is that between those countries that borrow predominantly in their own currency and those that borrow principally in foreign exchange. The former have the option of writing down the real value of their foreign debt through internal inflation—as a result of which the markets give them *less* latitude to contract foreign debt. One cannot, for example, assume that the United

²Compare the arguments in successive conference volumes: IMF (1970), Mundell and Polak (1977), and Dreyer, Haberler, and Willett (1982).

States will be able to run a current account deficit at the rate now in prospect for the decade or more that it would take to reach the sort of debt/GNP ratios at which the Latin debtor countries got into trouble.

IV. The Adequacy of Reserve Supply

While the monetary-base view of reserves may have had some residual validity in the pegged-rate Bretton Woods system,³ there can surely be no doubt that under current circumstances—with exchange rates flexible even when not formally floating and the major countries integrated into a worldwide capital market—it is the buffer-stock view of reserves that should guide assessments of reserve adequacy. It has also been argued that reserve supply is endogenous and that the level of reserves is demand-determined so far as the industrial countries are concerned. What are the implications for assessing the adequacy of reserve supply?

A first implication is that it is necessary to analyze separately the positions of the industrial countries (plus the capital-surplus oil exporters) and the capital-importing developing countries. For the former group, which has just over two-thirds of IMF quotas, one can assume that countries will be holding more or less the reserves they desire. There will be times when buffer stocks will be run down to less than the levels countries would prefer, and when they will not be replenished rapidly by going out and buying foreign exchange with domestic currency in the foreign exchange market, because this would accentuate the exchange rate fluctuations that reserves are held to mitigate. And there will be times when buffer stocks rise to levels in excess of perceived needs. But it is in the nature of buffer stocks that over some (possibly wide) range such fluctuations will simply be accepted rather than prompting a policy change. And the opportunities countries have to manage their buffer stocks without jeopardizing other objectives are—except in stabilization crises—good. Hence one can assume that these countries hold as many reserves as they need or desire.

There is an important corollary. If these countries receive additional reserves, e.g., as the result of an SDR allocation, they will not be prompted to seek a proportionate increase in their money supplies (as the monetary-base view of reserves would imply). They will simply be less inclined to induce foreign borrowing, more inclined to reduce domestic interest rates to encourage foreign lending, less inclined to intervene to buy foreign exchange, and more inclined to intervene in support of their own currency. While a reduction in domestic interest rates implies some monetary expansion, any change in intervention policy will tend to work in the opposite direction, and the net effect is in any event likely to be modest. The primary effect of an SDR allocation will be to diminish the volume of currency reserves. This point is important because much of the hostility to substantial SDR allocations seems to stem from a lingering belief that this involves injecting large quantities of “high-powered money” into the world economy, and is therefore bound to

³But Triffin's historical study (1964) cast doubt on the exogeneity of the money stock, and therefore on the monetary-base theory of reserves, even under the classical gold standard.

be inflationary—a belief that depends on the monetary-base view of reserves, and that is utterly unfounded in today's world.

Since mid-1982 the situation of the capital-importing developing countries has been very different.⁴ They are now back in the typical Bretton Woods situation of having pegged exchange rates and limited borrowing ability. The debt crisis that has afflicted so many of these countries is, almost by definition, a manifestation of a reserve shortage. This is not to claim that the debt crisis was *caused* by a global reserve shortage, but simply to observe that it could occur only when the countries involved exhausted their reserves. The fact that this could happen implies that reserves are not demand-determined, and therefore that the type of analysis used to assess the need for the first SDR allocation—as presented in IMF (1970)—is appropriate.

My recent assessment of the case for a new SDR allocation (Williamson 1984) recognizes, and indeed tries to exploit, the differences in the situation of those two groups of countries. It may be of interest to review the approach I adopted in endeavoring to quantify the desirable size of a new allocation.

A first question I asked concerned the size of allocations that would be needed to provide through the SDR system for a growth of reserves related to the growth in trade. I adopted the estimate of 3 percent trend GNP growth of the OECD, and applied to it the Bergsten-Cline (1983, p. 74, n. 26) equation relating OECD growth and trade growth, to estimate a 4 percent trend growth in the volume of world trade. To that I applied von Furstenberg's (1982, p. 88) estimate of an income elasticity of the real demand for reserves of 0.65 to get a growth in the real demand for reserves of 2.5 percent, or SDR 9 billion, per year.

A second approach sought to estimate the reserve shortfall of the developing countries, as of mid-1983. For this purpose I adopted the traditional rule of thumb that under Bretton Woods conditions (a pegged exchange rate and limited capital mobility) the minimum safe reserves/imports ratio is 25 percent, or three months worth of imports. One inevitably feels uneasy about resting so much on a rule of thumb, but this particular one has been hallowed by time and recent developments have not suggested that it has ceased to be useful. The reserve shortfall of the capital-importing developing countries was estimated as the difference between published reserves and what would have been needed to achieve a 25 percent reserves/imports ratio, *plus* the exaggeration of published reserves referred to above (estimated as at least SDR 10 billion).

The question arose as to whether the resulting SDR 21 billion shortfall constituted the appropriate level of total SDR allocation, or whether it should be multiplied by three (since the capital-importing developing countries have about one-third of IMF quotas). An allocation of 21 billion would imply that the countries with a reserve shortage would have only one-third of their shortage remedied by allocation, and would have to earn the remaining two-thirds. According to the traditional theory in which reserves are not demand-determined, this would be appropriate: the other countries would

⁴Indeed, the least-developed countries never achieved the level of creditworthiness needed to make their reserves demand-determined, even in the 1970s.

receive more reserves than they desired to hold, and would therefore allow the reserve-deficit countries to earn the extra reserves they need. Creating three times as many reserves as needed would instead result in excessive global reserves and the threat of competitive payments policies to dispose of the excess. With demand-determined reserves, matters are less clear: in the limit the creditworthy countries might simply neutralize their allocations by cutting back their borrowing from the Euromarkets, and the reserve-deficit countries might find it no easier than without an SDR allocation to earn the two-thirds of their reserve shortages that they did not receive via allocation. Despite some sympathy for the second viewpoint, I opted for the more traditional interpretation—on the ground that any biases in my calculations should be in a conservative direction.

An easier question concerns the allowance to be made for inflation in translating growth in real reserve demand into the desirable rate of SDR allocation. The last thing that SDR-creation policy should do is to underpin expectations of continuing inflation. Accordingly, I made no allowance for future inflation in determining the desirable rate of SDR allocation. In this instance principle and conservatism argued the same way.

There is also the question of gold. Despite a desire to give my calculations a conservative bias, I could not persuade myself that gold holdings should be taken into account as a part of reserves in calculating the existing reserve level.

The final question relates to timing. The earliest feasible date for a new allocation is presumably January 1985. My calculation of reserve shortfall was made for mid-1983, the latest date for which reasonably comprehensive data were available. I suggested a figure of SDR 34 billion as the desirable size of an allocation in January 1985, consisting of SDR 21 billion to make good the estimated shortfall plus 18 months' growth at SDR 9 billion per year. This procedure might be criticized as making no allowance for growth in reserve supply from other sources in the 18-month interval between mid-1983 and the end of 1984. In fact reserves grew by no less than SDR 21 billion, or 6 percent, in the first six months of this period. This increase was distributed: SDR 12 billion to the industrial countries, SDR 4 billion to the oil exporters, and SDR 5 billion to the non-oil developing countries (of which almost SDR 2 billion was accounted for by China). If this rate of growth is extrapolated to the beginning of 1985, it would suggest that 60 percent of the forecast capital-importing developing country reserve shortfall (15 out of: 21 plus a third of 13.5) will have been satisfied from alternative sources. The projected reserve shortfall to be made good by an SDR allocation would then be SDR 10 billion rather than SDR 34 billion—a number that looks distinctly closer to the realm of the politically possible.

Perhaps this approach can be used to rationalize a pruning back of the large numbers that emerged from my study to something politically acceptable. But, while I should have made some allowance for reserve accumulation from alternative sources in the period between the date used to estimate a reserve shortfall and the date planned for allocation, full discounting may be excessive. This is because reserve supply is elastic, so that one expects a reserve shortfall to be eliminated over time by one means or another, whether

or not there is an SDR allocation. If countries knew that they could expect an allocation at the beginning of 1985, they would tend to build up fewer reserves through 1984 than they have been doing recently. What needs to be asked is whether the world economy will function better if that reserve shortfall is made good through an expansion of reserve currency holdings or through an SDR allocation.

A requirement that the debtor countries push adjustment far enough to replenish their reserves through payments surpluses—in addition to curbing the buildup of debt and servicing existing debt—would imply the need for other countries to accept further curbs on their exports, and/or absorb yet more imports from the debtor countries, and/or pressure their banks into yet larger involuntary lending. It seems clear that, at the margin, such an obligation would be found irksome, and that the industrial countries also should therefore prefer to see reserve replenishment accomplished via SDR allocation. Furthermore, a buildup of currency holdings would take the form predominantly of dollars, and would therefore tend to accentuate the overvaluation of the dollar. Indeed, considerations of exchange rate management—or rather the lack of it since the initial declines of the yen and DM in 1979–81—would suggest that the reserves of the industrial countries may also be on the low side. It would be interesting to know whether the reduction in intervention has in part been caused by a desire to avoid a further depletion of reserves.

V. The Composition of Reserves

In my 1973 survey article, I argued that three issues had emerged as fundamental in the design of a new reserve asset: “The prevention of instability due to the confidence problem, the control of the volume of liquidity in the interest of stabilization, and the size and distribution of the resource benefits (or costs). . .” (Williamson 1973, p. 717). These are surely all important issues in judging whether reserve composition is appropriate. I would now add two other issues: the question of “backing,” which I was inclined to dismiss in 1973, and the question of usability. The present section evaluates the appropriateness of present reserve composition in terms of these five criteria.

Backing

In one of the best-known passages of his assessment of the Rio Agreement to create the SDR, Fritz Machlup (1968, pp. 66–68) wrote of how the myth of “backing” had been scuttled:

The notion of backing is associated with the notion of debt money. The issuer of the debts . . . which circulate as money is supposed to hold good assets against the circulating liabilities, and the quality of the assets is believed to be a necessary condition of the moneyness (that is, acceptability) of the liabilities. Since the assets “behind” the debt-money are ordinarily debts of some financially respectable and credit-worthy persons, corporations, or countries, the theoretical link between the quality of the ultimate debtors (backers), the quality of the

assets (backing), and the acceptability of the immediate debt (money) seems to be established. This venerable myth has long enjoyed wide currency, especially in banking circles.

Practically all the plans and schemes for the creation of new international liquidity had incorporated these notions. There was to be a central legal debtor—the IMF, BIS, or a new international institution—and the certificates of deposit liabilities of this legal debtor (or drawing rights against this legal debtor) were to be backed by the currencies or securities of the debtor's debtors—the financially responsible countries.

The new facility established by the Rio Agreement dispenses with the central legal debtor of the special drawing rights and, of course, with the debtor's debtors. By implication, it disposes of the old myth of backing. In so doing, the officials of the Fund and of the negotiating governments showed a courage far greater than the academic economists have had. Not that any reputable economist of our time has believed the old myth; but they were convinced that all bankers and other practical men of the world of finance believed in the myth and could not possibly be "enlightened." Thus, the academic economists had not dared to recommend schemes that would do away with the trappings of backing. Now the forward-looking experts of the Fund and the negotiating governments have proved that their reputation for backwardness in economic thinking had been undeserved. (I propose that they be granted honorary doctor's degrees by the great universities.)

All that matters for the acceptability of anything as a medium of exchange is the expectation that others will accept it. If over a hundred central banks or national monetary authorities including those of the major trading nations of the world agree to accept SDRs from one another in exchange for convertible currencies, this is all that is needed to establish the moneyness of the SDRs in inter-central-bank transactions. Money needs takers, not backers; the takers accept it, not because of any backing, but only because they count on others accepting it from them.

The myth of backing is dead. It was buried in Rio de Janeiro on September 29, 1967.

There is no doubt that what money needs is takers rather than backers; the doubt is whether a formal agreement to take, even if subscribed to by all the leading monetary authorities, will carry complete conviction in the absence of obligations that provide reassurance under a worst-case scenario.

The willingness to stand behind a country's own currency is not in serious doubt. Gold is an asset with "intrinsic" value. In both cases potential holders may have concerns about fluctuations in value, and this may give rise to confidence problems. But a concern that in *extremis* there might be no one with "real wealth" who recognized an obligation to service or accept the assets is unique to the reserve assets provided by the Fund. I have frequently encountered reservations about a rapid expansion in the role of the SDR which make sense on no basis except such a concern. The debate on creation of a Substitution Account in 1979–80 suggested a preoccupation with such issues (Gowa forthcoming 1984). And surely history shows too many cases of

international undertakings having been disregarded to justify labeling such concerns irrational. Machlup's obituary notice for the principle of backing was, I fear, premature.

Usability

The purpose of holding reserves is to enable a country, if it so wishes, to support its rate of exchange when its external payments are in deficit. Since such support is nowadays provided through intervention in the foreign exchange market, the most usable reserve assets are currencies, which can be used directly for that purpose. Both Fund-related assets and gold have first to be converted into currencies before they can be used in intervention. (The great uncertainty about the price at which the latter conversion can be effected is the basic reason for questioning whether gold still functions as a reserve asset. See Section II.)

It has recently been argued that the inability to use the SDR as an intervention medium impedes its acceptance as a reserve asset (Kenen in von Furstenberg 1983, pp. 342-43). Perhaps more important, the lack of a wide and deep private market in SDRs seriously compromises the suitability of the SDR as a currency peg, since even if a country's effective exchange rate would be more or less stabilized by pegging to the SDR, this macroeconomic advantage can be realized only by depriving a country's traders and borrowers of any stable link to a currency in which their international contracts can be expressed (Williamson 1982b). Until the SDR becomes an asset that is widely used by the private sector and transferable between the private and official sectors, it seems certain to remain confined to a peripheral role in the international monetary system.

Confidence

The developments of the past decade have profoundly changed the nature of the confidence problem. On the one hand, the adoption of generalized floating has changed the consequences of reserve shifting in a way that received theory teaches should be stabilizing: a shift out of an asset causes its value to depreciate, and therefore (under regressive expectations) reduces the attractiveness of a further shift, instead of eroding the ability of the issuer to sustain its commitment to maintain the price. On the other hand, the move to a multiple reserve currency system has further multiplied the number of assets among which shifts are possible in response to changes in confidence.

Evaluation of the second development depends upon whether received theory is correct in arguing that reserve shifts are relatively innocuous under floating. If central bankers determine the portfolio composition of their reserves by maximizing expected yields under rational expectations, they will act as classical stabilizing speculators, and the advent of a multiple reserve currency system need occasion no alarm. If, however, they are prone to jump on bandwagons, the multiplication of reserve assets will tend to generate additional instability as confidence waxes and waves.

In a forthcoming paper, Bergsten and Williamson (1984) attempt to discriminate between these two hypotheses using IMF data on reserve composition. Publication of the results has been delayed pending revised and updated data, but the calculations made two years ago indicated that central banks tended to destabilize exchange rates, and to lose money in the process, as a result of their portfolio decisions. (Note that these conclusions relate to reserve switching behavior, not to intervention.) Central banks did tend to lean against the wind, but they leaned harder when the wind started to blow (i.e., when the rate was still moving toward equilibrium) than when it had blown for a long time (i.e., when the rate was moving away from equilibrium), so that the net effect of their switching was to push rates away from their trend values. It should be added that the quantitative impact of these switches in destabilizing exchange rates does not appear to have been very large, according to the results of two of the large econometric models.

Control of Liquidity

A major advantage claimed for introduction of the SDR was that it would give the international community the power to control the volume of liquidity, or at least to remedy a shortage of reserves, in the cause of stabilizing the world economy. The failure to exploit this potential during the last two years (especially since inflation had started to subside), when the need was clearer and more urgent than at any time since invention of the SDR, must cast doubt on whether the existence of this legal power means very much. An economic instrument can be of value only if its political masters are susceptible to rational economic arguments in determining how it should be wielded.

The volume of reserves held by the industrial countries is essentially demand-determined. The part of the reserve stock in elastic supply, which accommodates changes in demand, is the reserve currency element. The fact that supply is elastic means that it cannot be an active element in determining countries' policies, either as a useful discipline or mechanism of coordination, or as a disruptive pressure for excessive inflation or deflation. (This does not mean that the macroeconomic policies of the leading countries cannot exert such pressures—or produce reserve changes as a byproduct).

At one time fears were expressed that fluctuations in the gold price might induce variations in the value of gold reserves that would motivate competitive payments policies. For example, if many countries simultaneously found that the value of their reserves had increased because of a rise in the gold price, they might be tempted into simultaneous pursuit of excessively expansionary policies in an attempt to reduce reserves toward their target levels. I am aware of no evidence which suggests that countries have in fact modified their policies in the light of changes in the gold price—which is, of course, consistent with the view that gold is no longer a reserve asset.

Seigniorage

The question of seigniorage is that of who gets the real resources that are

released to the issuers of money, or in this instance the issuers of reserves.

Seigniorage arises to the extent that a country is able to finance its net debt (or net creditor) position vis-à-vis the rest of the world more cheaply than would otherwise be possible by virtue of its ability to issue a reserve currency, borrow from the Fund, or receive SDR allocations. Since currency reserves, and now Fund-related assets, pay competitive interest rates, the reduction in borrowing costs that these possibilities permit is modest (though positive) for the industrial countries.

The situation is very different so far as the developing countries, and especially the less creditworthy ones, are concerned. In order to build up a buffer stock of currency reserves of prudent size for precautionary purposes, these countries have to borrow from the international capital market at substantially higher rates than they earn on their reserve holdings. The receipt of SDRs to satisfy the normal demand for reserves-to-hold would be a significant benefit. That benefit is being realized on only a modest scale today: in mid-1983 capital-importing developing countries had received net cumulative SDR allocations of SDR 6.7 billion, while their published nongold reserves were SDR 100.2 billion. Even allowing for considerable exaggeration of published reserves, the developing countries were clearly substantial net creditors on monetary account. This is offensive to those with an egalitarian welfare function.

The offense is compounded by the way in which the developing countries were discouraged from diversifying their reserves into gold back in the days of the Bretton Woods system, and then received in compensation for their nonparticipation in the capital gains from the rise in gold price merely the profits on one-sixth of the Fund's holding of gold. But that is a sad story that has little to do with today's monetary system.

It should also be remarked that the continued hoarding of about 1 billion ounces of gold by the world's monetary authorities has a real cost. Gold is a commodity with nonnegligible industrial, artistic, and dental uses, which are currently severely curtailed by the high price of gold. That price could be reduced for many years by release of the gold that formerly played a monetary role.

VI. Policy Proposals

The preceding discussion has brought to light a number of areas where international action on reserve arrangements might serve to improve the functioning of the global economy. The present section focuses on those areas and sketches appropriate policy initiatives.

SDR Allocation

As noted above, there has been a failure to use the mechanism of SDR allocation in order to remedy the reserve shortage currently afflicting the capital-importing developing countries. More generally, the SDR system has not in fact been exploited to allow the less creditworthy countries to gain adequate precautionary balances, or reserves-to-hold, without first borrowing

(or exporting real resources).

The immediate problem of reserve shortage could be addressed by a substantial SDR allocation, as urged in my recent study (Williamson 1984). This would also go a modest way toward alleviating the more general complaint.

Three objections seem to underlie opposition to this course of action. The first is that it might be inflationary. Much of the feeling along these lines seems to be based on the old monetary-base view of reserves, which I have already argued to be utterly misleading in present circumstances. Even the buffer-stock view of reserves recognizes that SDR allocation could be inflationary if it occurred on such a scale as to present countries with excess reserves which they would go out and compete to spend. But the scale of allocation proposed in my study was calculated precisely with a view to ensuring that it did not give rise to excess reserves.

A second objection is that an allocation might undermine the incentive of the debtor countries to take the action that is needed to resolve the debt crisis, which is of course resolute pursuit of the adjustment policies on which almost all of them have now embarked. The numbers suggest that this is not very likely: even the large allocation proposed in my study would yield the largest debtor, Brazil, only SDR 552 million, a modest sum compared to the entitlement to draw SDR 1.4 billion during 1984 under the Fund's high-conditionalities facilities, not to mention its recent \$6.5 billion bank loan.

The final objection is that SDR allocations are just another way of providing aid. This is of course precisely what the developing countries have long wished them to be—this is the idea of the link proposal. I long favored the link, on the grounds that I favor more aid and that the link is a technically efficient way of giving effect to a political consensus in favor of more aid. It is clear, however, that there is no political consensus in the major industrial countries in favor of more aid to all low-income IMF member countries, irrespective of the use they make of the resources or of the record of the government in question. No proposal that is perceived to involve aid for Kampuchea is going to be politically salable in the North. Moreover, if Machlup was premature in announcing the burial of the myth of backing, there is after all a serious technical objection to the link.

But the SDR scheme as originally conceived was not intended to be a vehicle for providing aid. It would indeed be more accurate to regard it as an instrument for avoiding "reverse aid"—a transfer of resources from poor to rich—occurring in the process of the developing countries building up prudent levels of precautionary balances. Since the developing countries are large net creditors on monetary account, the reserve system currently involves substantial reverse aid. An SDR allocation would involve aid only in the sense of reducing the reverse aid inherent in current arrangements.

The reasoning used to establish that conclusion is, however, fairly subtle. A Congressman asked to acquiesce in U.S. approval of an SDR allocation is more likely to focus on the fact that this would permit Kampuchea (and South Africa) to obtain dollars—unconditionally and for an indefinite period—which the U.S. Treasury or Fed would in effect have to borrow. On average these countries may well be lending more to the U.S. Treasury (because, for example, they hold reserves in Treasury bills), but this

is not evident in the accounting, and it need not always be true.

In the hope of alleviating such concerns, I suggested in my study the possible reconstitution of the reconstitution provision. It is true that for the vast majority of countries this would be cosmetic, since it would influence reserve composition rather than induce countries to hold more reserves than they otherwise would have done. It nevertheless seemed to me that, by making the nature of the services provided by the SDR more transparent, it might help to allay some genuine concerns.

But the reconstitution provision fell into disfavor at least in part because it was a clumsy arrangement. It prevented use of a country's whole SDR stock to finance deficits for anything beyond a rather limited period (perhaps three years). On the other hand, by allowing countries to use 70 percent of their allocations permanently, it was not a particularly effective instrument for providing reassurance that countries would not be able to gain a permanent resource transfer by running down their SDR holdings. Another problem arose on policing the reconstitution provision. Countries would delay reconstituting until the end of a five-year averaging period approached: in principle a country could always plan to buy up enough SDRs in the last week (or day) of the period to raise its average holding to the critical level. But then at the last moment it might have insufficient reserves, and plead force majeure; or there might not be enough available SDRs in the system to allow all countries to reconstitute simultaneously.

In my study I endeavored to mitigate these problems by suggesting lengthening the averaging period over which reconstitution applied, raising the necessary minimum holding level, and introducing guidelines as to when countries ought to reconstitute. It has subsequently been suggested to me that there may be a much better way of meeting the concerns that my proposal to reintroduce reconstitution was designed to allay. This would involve the imposition of a penal interest rate on use of the SDR beyond some level. If the interest charge on use of the SDR were *higher* rather than lower than the interest rate at which countries were normally able to borrow, they would clearly choose to use their SDRs only in difficult situations, i.e., when precautionary reserves *ought* to be used. There would be no possibility of gaining a permanent transfer of real resources from an SDR allocation, and this fact would be reassuringly obvious to everyone.

One should allow a reasonable level of SDR use at the interest rate paid to holders,⁵ especially if the proposal discussed below were to be introduced, so that the SDR became a transactions medium. In order to avoid penal interest rates being charged on SDRs that have already been allocated and perhaps spent, it would no doubt be appropriate to ensure that the tranche of normal-interest SDRs was at least as large as the existing stock at the time the new arrangements were adopted. Beyond that, interest charges might rise in a graduated way with the extent and duration of SDR use, on lines that recall proposals made for implementing a reserve indicator system in the Committee of Twenty—not to mention Keynes's proposals for charges on the use of *bancor* overdraft rights.

⁵It would not be appropriate to raise the interest rate presently paid to SDR holders: rather, excess income of the SDR Department might be paid into the Trust Fund.

There has never been any evidence that U.S. policy (or the U.S. Congress) was motivated by a desire to maximize the seigniorage benefits to the United States of the reserve role of the dollar, and so it is not axiomatic that the United States would reject a proposal that sought to eliminate the reverse aid inherent in present reserve arrangements—provided it were clear that there were no possibility of going any further than this. Since the developing countries would prefer to go further, they may be reluctant to endorse such ideas. But they surely need to question the wisdom of a strategy of demanding the unattainable, at the cost of precluding the considerable benefits they would reap through the provision of the bulk of their reserves-to-hold through the SDR system. For SDRs would still be able to satisfy precautionary needs, and they could prudently be allocated on a far larger scale than now seems likely, under a system incorporating penal interest rates on use beyond some modest level.

An SDR Clearinghouse

Another problem to which attention was drawn above is the limited usability of the SDR. Peter Kenen (in von Furstenberg 1983) has proposed a plan that would resolve this problem without requiring an amendment of the IMF's Articles. This would involve the Fund creating a clearinghouse entitled to hold SDR claims on the Fund itself and to accept SDR accounts from commercial banks. The clearinghouse would clear transactions among commercial banks and would permit transfers of SDRs between the official and private sectors, thus allowing the SDR to be used in intervention. The establishment of such a clearinghouse (or equivalent facilities in some other institutional form) would seem to be an essential precondition for evolution of the SDR as an active working instrument of international finance. An initiative of this type is overdue.

A Substitution Account

It might at some stage be worthwhile reviving the proposal to create a substitution account in order to provide some protection against reserve shifting. (The only other reforms of the reserve system that could hope to accomplish this, mandatory rules on reserve composition or a shift to a single reserve asset, are quite unrealistic.) In my view this will become a possibility only if and when the United States comes to accept the propriety of the former issuer of a reserve currency accepting a straightforward SDR liability, thus avoiding the complications and ambiguities that killed the last proposals for substitution in 1980.

Gold Demonetization

A test was suggested in Section 2 to determine whether the time has arrived for the statistical demonetization of gold. That test should be performed and its results should be accepted.

Complete demonetization of gold would require central banks to sell off their gold stocks in the private market. This appears highly desirable, in order

to eliminate the residual fear that fluctuations in the gold price might generate macroeconomic instability and in order to contribute to microeconomic efficiency, but somewhat improbable.

VII. Concluding Comments

The preceding suggestions for policy initiatives have an obvious omission: there is no proposal designed to try to ensure discipline on global monetary expansion. This is not because I see no value in such discipline, but because rejection of the monetary-base view of reserves implies that reserve policy is not the way to accomplish such control. Mutual agreement among a group of leading countries designed to manage their exchange rates and to target consistently their rates of domestic credit expansion, as urged by McKinnon (1984), is the only feasible proposal to that end.

Even the initiatives that I would strongly urge, for a substantial SDR allocation, the introduction of penal interest rates on SDR use beyond a certain point, and the establishment of an SDR clearinghouse, may not find immediate welcome in an age that has come to treat muddling through as a positive virtue. One cannot help reflecting how much more open to innovation based on rational analysis the world was in 1944 than it is today.

REFERENCES

- Bergsten, C. Fred, and William R. Cline. (1983) "Trade Policy in the 1980s: An Overview," in William R. Cline, ed., *Trade Policy in the 1980s*. Washington, D.C.: Institute for International Economics.
- _____, and John Williamson. (Forthcoming 1984) *The Multiple Reserve Currency System*. Washington, D.C.: Institute for International Economics.
- Black, Stanley W. (1983) "The Effect of Alternative Intervention Policies on the Variability of Exchange Rates: The 'Harrod' Effect," working paper no. 83-W06. Vanderbilt University Department of Economics.
- Dreyer, Jacob S, Gottfried Haberler, and Thomas D. Willett. (1982) *The International Monetary System: A Time of Turbulence*. Washington, D.C.: American Enterprise Institute.
- Edwards, Sebastian. (1983) "The Demand for International Reserves and Exchange Rate Adjustments: The Case of LDCs, 1964-1972," *Economica*, August.
- Frenkel, Jacob A. (1983) "International Liquidity and Monetary Control," in George M. von Furstenberg, ed., *International Money and Credit: The Policy Roles*, Washington, D.C.: International Monetary Fund.
- Gowa, Joanne. (forthcoming 1984) "Hegemons, IOs, and Markets: The Case of the Substitution Account," *International Organization*.
- Group of Ten. (1965) *Report of the Study Group on the Creation of Reserve Assets*. (Ossola Report).
- Harrod, Roy F. (1965) *Reforming the World's Money*. London: Macmillan.
- IMF. (1970) *International Reserves: Needs and Availability*, Washington, D.C.
- Machlup, Fritz. (1968) *Remaking the International Monetary System: The Rio Agreement and Beyond*. Baltimore: Johns Hopkins.
- McKinnon, Ronald I. (1984) *An International Standard for Monetary Stabilization*. Washington, D.C.: Institute for International Economics.
- Mundell, Robert A, and Jacques J. Polak. (1977) *The New International Monetary System*. New York: Columbia University Press.
- Triffin, Robert. (1947) "National Central Banking and the International Economy," *Review of Economic Studies*, February.
- _____. (1964) *The Evolution of the International Monetary System: Historical Reappraisal and Future Perspectives*. Princeton: Studies in International Finance no. 12.
- Von Furstenberg, George M. (1982) "New Estimates of the Demand for Non-Gold Reserves under Floating Exchange Rates," *Journal of International Money and Finance*.
- _____. (1983) ed., *International Money and Credit: The Policy Roles*. Washington, D.C.: International Monetary Fund.
- Williamson, John. (1973) "International Liquidity: A Survey," *Economic Journal*, September.
- _____. (1982a) "The Failure of World Monetary Reform: A Reassessment," in R.N. Cooper et al., eds., *The International Monetary System under Flexible Exchange Rates: Global, Regional, and National*. Cambridge: Ballinger.
- _____. (1982b) "A Survey of the Literature on the Optimal Peg," *Journal of Development Economics*, September.
- _____. (1984) *A New SDR Allocation?* Washington, D.C.: Institute for International Economics.

Discussion

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John Williamson has given us a wide-ranging and stimulating paper in a field in which he is a well-established expert and where his own thoughts, as those of all of us, appear to be evolving. I find myself mostly in agreement, but there are some doubts and questions. I shall pass over the issues of the concept and measurement of liquidity and go straight to a number of central issues. As in John Williamson's paper, the focus of my comments will be on the role of SDRs, and especially whether their supply should be increased and—more generally—whether an increase in their supply matters. I shall first deal with SDRs and the industrial countries and then with the developing countries.

International Liquidity and the Industrial Countries

In various parts of his paper John Williamson makes two crucial points. The first is that, because of the existence of a well-functioning world capital market, international liquidity in the hands of the industrial countries is now endogenous, and there is no need to "create it" centrally. He says that it is "demand-determined," but I would prefer to describe it as demand-and-supply determined—i.e., market-determined. If more SDRs were created, market forces would lead to adjustments such that total liquidity may not change at all, or not much. This view has, in effect, been accepted by the Fund in the regular discussions of the "reserve adequacy" issue in the *Annual Reports*. I have set it out in some detail in my own discussion of these matters in von Furstenberg (1983).

The logic of this view is that the natural tendency for the supply and composition of international liquidity is to be "adequate," in the same way as the supply of anything else in a market is "adequate." Of course there may be distortions, lack of information, and so on. If one accepts this view, then much of the classic discussion of the liquidity problem is no longer practically relevant.

The second point he makes is that the supply of liquidity need no longer affect world inflation or deflation. Thus, if liquidity were increased, this need not be inflationary through domestic monetary repercussions.

In the case of a fixed exchange rate system there would be some tendency for the domestic money supply to expand when there is reserve ease, and the reverse when there is a reserves shortage. Only in special cases would there be a firm, rigid link. But once exchange rates can readily alter, there need be no connection at all between reserves and the money supply. A coun-

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try that has excess reserves will still wish to increase its imports, but it can bring this about by appreciation of the exchange rate combined with appropriate increase in absorption such as to keep demand for domestic goods and services constant. There need be no rise in domestic employment, nor a rise in the domestic price level.

It follows that, in a world of floating or flexible exchange rates, each country can determine its own rates of money supply growth and price inflation. Of course, interest rates will still be related, and through the terms of trade (affected by aggregate demand policies in different countries) real wages, and hence employment, may depend on foreign conditions, so that monetary insulation does not mean real insulation.

I also sought to stress this insulation theme in my paper mentioned above, and it is a second reason why the discussions of the sixties and early seventies seem barely relevant now. Even if the centralized creation of reserves succeeded in changing total international liquidity, this need not have any effects on world inflation or deflation.

SDRs and the Debt Crisis

Turning to the developing countries, the immediate problem is the liquidity crisis involving a limited but very important group of countries. It is widely agreed that, somehow or other, they ought to be provided with more liquidity. From the point of view of the international system, it would be highly desirable if these countries obtained assured extra drawing rights at below market rates of interest (which is what SDRs are). Of course, in the short run there would be costs for the taxpayers in the industrial countries. These drawing rights are available unconditionally, but if conditional loans are required in addition, then conditionality will remain. But the pressure to adjust will be moderated to the extent that the net result is for more funds in total to be provided. It seems reasonable to conclude that—provided a significant increase in net funds available to the debtor countries results (i.e., provided there is not a fully offsetting reduction in other sources of funds and the SDR increase is large enough)—a general increase in SDRs would have a favorable effect on the debt situation.

The provisos are really most important. As John Williamson has pointed out, the magnitudes generally contemplated for a new issue of SDRs are small in relation to the debt problem. I draw attention to the figures he has cited for Brazil. The problem is clearly not going to be solved, or even significantly eased, by the method of a general issue of SDRs.

There is another, rather obvious, point. It is a rather clumsy way—cracking an admittedly large nut with a very broad sledgehammer—to try and improve the liquidity of a small group of countries by increasing the supply of SDRs to everyone, including the industrial countries who would get the great bulk of a new issue and yet do not need it. John Williamson and I agree that a large issue of SDRs to industrial countries would lead to various adjustments such that finally their reserves might not increase much at all, a reduction in foreign exchange reserves at least partially offsetting the increased SDRs. Furthermore, we agree that an increase in reserves need not be inflationary.

Hence there would not really be any harm in a large issue of SDRs to industrial countries. But it is most unlikely that a general issue would be large enough to make a significant difference to the indebted developing countries (through the SDRs issued directly to them). The reason is that decision-makers in the industrial countries *do* believe that a large world-wide increase would be inflationary.

I conclude then that SDRs are, more or less, irrelevant to this immediate debt crisis problem.¹

International Liquidity and the Developing Countries in the Longer Run

Having already concluded that SDRs are irrelevant for the industrial countries as well as being relatively unimportant for the debt crisis, there remains one question: are SDRs relevant for those developing countries not involved in the present crisis, and are they likely to be relevant in the longer run for the current-debtor developing countries once the crisis has passed or been resolved in some way?

I think it is a theme of Professor Williamson's paper and of his other recent paper—Williamson (1984)—that this is where the relevance really lies. We have a group of countries that are not perceived to be creditworthy by the private market, and yet they need owned reserves that grow with their trade. They cannot obtain them in the market by borrowing.

In theory they could obtain extra reserves with current account surpluses. There appears to be no problem in the next few years about the willingness of the United States to run the current account deficit that would need to correspond to the required surpluses of the developing countries. The U.S. budget deficit is ready made for helping to solve any world "liquidity shortage." The problem is, of course, that the generation by developing countries of the required surpluses would involve an expansion of exports and reduction of imports that is hardly possible and would, if brought about, involve great sacrifices. Is it then not better to issue developing countries (and, perhaps as a by-product, industrial countries as well) with a steady flow of new SDRs?

This seems to me a convincing argument for regular SDR allocations. But its implications should be noted. If the countries *were* thought creditworthy by the market, they could always borrow when they were in need. When they use their SDRs they are automatically allowed to borrow, but also have to pay an interest rate, namely the usual rate on SDRs. But if the view that they are not creditworthy were correct, one could not be sure that they would actually be willing or able to pay the interest on the SDRs they used. The risk has to be carried somewhere, presumably by the IMF and its members. When SDRs are accepted in payment, governments are willing to lend to certain countries even when the private market is not. If the private market were willing to lend, there would be no need for SDRs. That is the situation that applies to industrial countries and, until a few years ago, also to the now-indebted developing countries. On the other hand, in the situation

¹John Williamson told me afterwards that he agrees with this conclusion.

envisaged, an issue of SDRs implies certain risks.²

It may be that the private market is overreacting, so that it ought to be willing to lend the modest amounts which the use of SDRs allows countries to borrow automatically. There may thus be an information or lack of judgment problem in the market. That seems to be the central issue or implication. Alternatively, the argument is simply that the provision of SDRs includes an element of aid. It makes it possible for countries to have assured borrowing rights at interest rates that do not fully allow for perceived risks.

Other Matters

Finally, let me turn to a few specific points in John Williamson's paper.

Does it matter whether gold stocks are "reserves"? In the case of the countries that hold most of the gold, reserves are endogenous anyway and, as discussed earlier, the policy issue of optimal reserves creation does not arise. But relatively little gold is held by official authorities in those countries where there *is* a liquidity problem and thus where the policy issue arises.

Another point. John Williamson makes the interesting observation that reserve center countries may have more difficulty borrowing than nonreserve center countries, other things equal, because there is always the risk that they will inflate away their debts, something that countries which borrow in terms of foreign currency cannot do. He suggests that this consideration will reduce the willingness of the non-U.S. world to continually finance U.S. deficits. My comment is that the inflationary expectations will be embodied in the interest rate, and there will always be some nominal interest rate that will compensate for these expectations. If U.S. monetary policy sought to avoid a rise in the U.S. nominal interest rate some current depreciation of the dollar (given expected depreciation associated with expected inflation relative to other countries) would be needed to bring about the desired expected real return to foreign holders of dollar balances.

I think John Williamson may have in mind a situation where the United States seeks both to avoid a rise in nominal interest rates and a depreciation of the dollar sufficient to maintain the required flow of funds into the United States.

Finally, I must refer to the argument that there has been "reverse aid" because the developing countries are creditors on monetary account. Presumably the argument is that they are borrowing funds at high interest rates and then lending them back at low rates. It seems to me that they have been "buying" liquidity. The funds that they lend are (one hopes) in safer hands, and more liquid, than the funds their now-unhappy creditors have lent to them. They have been paying for an expected service, rather than giving aid.

It used to be said once that developing countries were getting aid to the

²It was pointed out to me at the conference that the Fund is a preferred lender, and it is very unlikely that countries would fail to pay full interest on the SDRs they used. Clearly, the larger the SDR allocation and thus the more SDRs are used for covering payments deficits in emergencies, the more likely it would become that a country would have difficulties in paying interest. If the country is also a borrower in the private market, then the existence of a preferred lender will increase the risks for the private lenders.

extent that they had current account deficits, and so were net borrowers, i.e., sellers of financial assets in return for receiving current real resources. We now see clearly that this was a market transaction and not aid. If the buyers of the financial assets find out later that these assets were not worth as much as they thought, and were possibly even completely worthless, they may have given aid by accident, but it was certainly not intended aid.

I feel we should confine the term aid to cases where goods or financial assets are clearly sold to developing countries below market prices or bought from them above market prices, the extreme case of pure aid being where the "sale" is at zero price.

Of course, this is only a semantic issue. One can readily agree that an increase in well-directed aid, for example through IDA or through a special issue of SDRs to particular countries, would be highly desirable, irrespective of whether there is now "reverse aid" or not.³

REFERENCES

- Von Furstenberg, George M., ed. *International Money and Credit: The Policy Roles*. Washington, D.C. International Monetary Fund, 1983. pp. 213-248.
- Williamson, John. *A New SDR Allocation?* Washington, D.C.: Institute for International Economics, 1984.

³John Williamson pointed out to me that the implication of my argument is that the international income distribution that results from market outcomes provides the base line, so that "aid" is any transfer that redistributes incomes away from that base line. That is a correct interpretation. We both agree that there is no particular virtue in the base line income distribution. Furthermore, the market outcome will be influenced by various distortions.

General Discussion

John Williamson responded that an SDR allocation would not necessarily be irrelevant simply because the reserve gains made by the debt-burdened developing countries would be small. Furthermore, an SDR allocation could provide a net social gain to the world economy by providing liquidity to the capital-importing developing countries at a much lower interest rate than they now pay.

Richard Cooper suggested that the dilemma surrounding an SDR allocation might be clarified by distinguishing between "owned" versus "borrowed" reserves. Cooper noted that developing countries are able to borrow reserves in the world capital market in "normal" times. However, such reserves tend to dry up in "troubled" times, when they are needed most. In the present crisis, an allocation of SDRs—an owned reserve—would make up partly for the unavailability of borrowed reserves to the debtor countries. This allocation would also alleviate the need for these countries to transfer more real resources abroad to service their external debt. Williamson added that since these countries' gross external debts exceed their reserves, all their reserves should be classified as borrowed.

Scott Pardee questioned how the United States would react to a major currency crisis since its reserves are comprised predominantly of gold and SDRs, neither of which the United States has shown any inclination to use. Williamson rejoined that an SDR increase could improve the U.S. reserves position. However, any such improvement would be of marginal benefit compared with the probable severity of a currency crisis. To forestall such a crisis, Williamson emphasized instead the need for improved international coordination of monetary policies.

Henry Fowler asserted that no single compelling *new* reason for an SDR issue has come to light. Yet an old reason still exists. Regular and modest SDR creations would encourage the SDR's use as the primary international reserve medium, as contemplated in the second IMF amendment. Williamson agreed that this was a viable reason for such issues. He added that if the vast external debt incurred by certain developing countries had been denominated in SDRs rather than dollars, the local currency costs of servicing and repaying these debts would not have risen so sharply.