



**‘GLOBAL INFLATION’ AND
‘THE PROPER USE OF POLICIES UNDER FIXED AND FLEXIBLE EXCHANGE RATES’
LESSONS FROM RESEARCH AND EXPERIENCES IN THE 70S AND 80S***

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Abstract

This paper discusses two issues related to current developments in the world economy against the background of analysis of similar topics carried out in the 1970s and 1980s by Professor Alexander Swoboda and his colleagues at the Graduate Institute of International Studies in Geneva, Switzerland. The first issue concerns the concept of global inflation and the second relates to the use of exchange-rate changes versus other policies to deal with global current account imbalances. It is argued that lessons from previous experiences with these phenomena and the analysis carried out at the time are helpful in interpreting current events.

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The views and analysis expressed in this note are those of the author, and do not necessarily represent the views of the Hong Kong Monetary Authority.

I. INTRODUCTION

Headline inflation rates have increased more or less simultaneously in a number of countries and regions during the past one to two years. Globalization has been mentioned as one of the possible factors responsible for this increase much as it was given as a reason for the subdued inflation rates in the same economies during the previous five to ten years. The term 'global inflation' was used in the late 1960s and '70s to describe a similar world-wide pattern of inflation rates that emerged at that time. Professor Alexander Swoboda at the Graduate Institute of International Studies (GIIS) was a prominent contributor to the analysis of the sources and spread of inflation at that time emphasizing the critical role of the Bretton-Woods exchange rate system of fixed exchange rates centred on the US dollar.

In the next section of this paper I first review the analysis of global inflation during the Bretton-Woods system as seen through research by Professor Swoboda and colleagues at the Graduate Institute of International Studies in Geneva, which I had the fortune of being associated with as a fresh PhD out of the University of Chicago. I then discuss whether this analysis can be used to shed light on the current debate about the sources and spread of global inflation pressures.

Section III takes up another theme in Professor Swoboda's research, namely the proper use of economic policies under fixed and flexible exchange rates. In several writings he had emphasized how the stability of a fixed exchange rate system required monetary policy to be 'assigned' to maintaining external balance and that this result fundamentally did not depend on the degree of capital mobility. Similarly the logic of a floating exchange rate system required that monetary policy be assigned to another objective, namely internal balance, or price stability as we would now call it. If ensuring external (current account) balance was also a goal of economic policy, some other instrument would have to be found. Fiscal policy was shown to be the appropriate choice.

The appropriate pairing of instruments and objectives was emphasised in analysis of the major 'global imbalance' of the early 1980s, namely the large current account deficit of the United States and the corresponding surpluses of Germany and Japan. At the time there was considerable pressure on the Japanese authorities to appreciate the Yen in order to solve the global imbalance. Research by Professor Swoboda and me showed that this policy prescription amounted to an inappropriate pairing of instruments and goals of economic policy. In section III I argue that the same error has been perpetuated in the context to the current 'global imbalance' where the Chinese authorities have been urged to appreciate the renminbi. To remedy this error, I propose that policy consultations and advice related to current account imbalances

should focus on policies that are likely to have a strong influence on these imbalances and should de-emphasize the notion of exchange-rate misalignments.

As befits a *Festschrift*, and as the reader will recognize, references to the literature in what follows are heavily biased towards articles written by Professor Swoboda. As I had the privilege of working closely with him during these years, my own, as well as jointly authored, articles also figure prominently. Alternative interpretations of the issues we wrote about were of course published, but the purpose of this paper is not to survey the entire literature but rather to describe what we believed at the time of writing and what relevance it may have today.

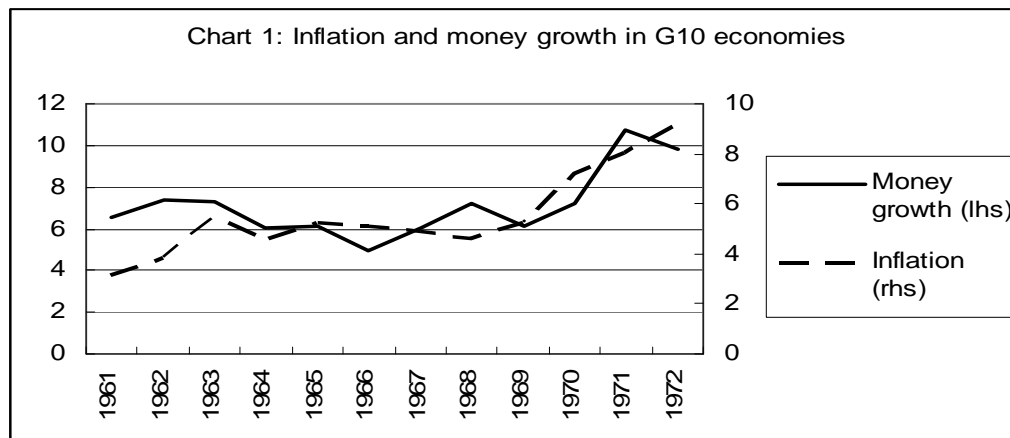
II. GLOBALIZATION AND INFLATION: THEN AND NOW

In the past several years much attention has been given to the possible influence of globalization on many aspects of economic activity, including inflation. Taking the IMF's World Economic Outlook as a barometer of the interest the international community places on certain topics, one notes that the April 2006 report had the subtitle 'Globalization and Inflation' and the October 2007 report contained an analysis of the meaning and measurement of 'global liquidity'. One set of issues that these reports addresses is the extent to which 'global liquidity' can be seen as a proximate cause of inflation in the world, and whether 'globalization' changes the nature of the impulses to inflation and their transmission across economies.

Then

These questions were the focus of intense debates and research back in the mid-seventies. At the Graduate Institute of International Studies a research project led by Professor Swoboda provided a fitting venue for contributing to these debates as part of our attempts to analyze and explain how the Bretton-Woods (B-W) system of fixed exchange rates functioned. Recall that annual inflation rates in the main industrialized economies had increased steadily in the 1960s and into the early seventies from an average of around 3% in the early part of this period to over 9% on the eve of the oil supply shocks that came to dominate discussions in the mid-seventies. The increase in inflation coincided with a similar increase in global liquidity, or in world money growth as it was frequently referred to at the time. (See Chart 1 for an illustration). The correlation suggested that there might be a causal relation between the two phenomena. Of course there was also a correlation between inflation and money growth at the individual country level, so a debate ensued between 'global monetarists', i.e. those who argued that inflation in the world economy could be usefully analyzed by focusing on the determinants of global demand and supply of money, and 'local', for want of a better word, monetarists who

focussed analysis principally on experiences in each economy separately.¹ Professor Swoboda and I belonged to the first group.



The theoretical case for a focus on global monetary factors rather than on individual countries derived from a view of the monetary adjustment mechanism in a fixed exchange rate system which at the time became known as the monetary approach to the balance of payments. We had both been influenced by Bob Mundell and Harry Johnson at the University of Chicago where this approach had been applied to issues of international adjustment and monetary policy under fixed exchange rates by Rudi Dornbusch, Jacob Frenkel, Mike Mussa, and many others.

A characteristic of the 'monetary approach' was a view that the international adjustment mechanism could be usefully analyzed by assuming markets for goods and assets were highly integrated internationally. In such a world, a change in money demand or money supply in one country would only succeed in influencing domestic interest rates - and hence aggregate demand and inflation - to the extent it would influence world interest rates. For very small open economies of negligible effective size, monetary policy initiatives of the central bank or changes in money demand would in the extreme case only have an impact on the balance of payments. The evolution of inflation would be entirely due to global phenomena.²

The international transmission mechanism was often described in terms of the Humean price specie flow mechanism whereby domestic monetary expansion would in a first instance lead to increases in domestic prices. This in turn would bring about a

¹ From today's perspective the focus on monetary analysis as the principal source of inflation may seem somewhat quaint, but thirty years ago it was relatively mainstream even though there was also a spirited debate between monetarists of both types on the one hand and economists who emphasized 'cost-push' and sociological explanations for the resurgence of inflation on the other. In the UK this debate was conducted forcefully by Michael Parkin and David Laidler and their colleagues at Manchester University with whom the Geneva research group maintained contacts at conferences and joint seminars.

² Of course, it was recognized that Balassa-Samuelson type effects could lead to differences in inflation rates across countries, but that was not something over which the central bank had any control.

balance of trade deficit and a reserve outflow which would increase prices abroad and partially offset those that previously had occurred at home. While this was theoretically convenient, it implied a time-series relationship between money and inflation in small open economies – i.e. that money should Granger-cause inflation - that was not always observed.³ Hence I would argue that a more robust, and certainly more rapid, transmission mechanism was the result of the integration of asset markets. On this interpretation, an increase in liquidity in the US market would lead to a decrease in interest rates throughout the fixed-rate system and the consequences for prices, output, and the quantity of money would depend on the speed of adjustment of these variables to the monetary stimulus and could very well be different across economies.

While the extreme assumption of perfect integration of goods and asset markets was unlikely to have been completely accurate, empirical evidence that we and others gathered did not contradict the global monetarist interpretation of the onset of inflation in the later years of the B-W system,⁴ but much of it begged the question what process determined the evolution of the world money supply, and in particular what was the role of the United States as centre country of the Bretton-Woods system. To answer this question Professor Swoboda built on his earlier work on the Eurodollar market and developed a model which implied that the money supply process in the B-W system was inherently asymmetric in view of the habit of non-US central banks to hold their reserves in US Treasury bills which implied that the effects on the US money supply of balance of payments disequilibria were effectively sterilized.⁵ For this reason, the US became the undisputed centre of the B-W system, not only by its economic size but also because of how the B-W system operated. In fact, it could be characterized as a de facto dollar standard. The asymmetry highlighted in Professor Swoboda's model did not appear to be contradicted by the facts.⁶

As a number of major central banks adopted floating exchange rates in the mid-seventies, the theoretical case for looking at global inflation and global liquidity seemed to disappear. Purchasing power parity theory implied that exchange rate changes should accommodate inflation differentials, so the concept of world inflation would lose its meaning.⁷ Likewise, not only did national monetary aggregates start to lose favour among academics and central banks, the notion of a world money supply or global liquidity was no longer believed to be relevant as individual countries could pursue their own monetary policy independently. The logic and rationale for the adoption of floating exchange rates meant that what went on in the rest of the world did not need to be factored into monetary policy considerations of individual central banks. Indeed, looking only at

³ Genberg (1974).

⁴ Genberg and Swoboda (1977).

⁵ Swoboda (1978).

⁶ Genberg and Swoboda (1981, 1993).

⁷ In the event, it turned out that deviations from PPP became even larger in the floating rate period (at least in the early part thereof) than it had been during the previous fixed rate period. Genberg (1978).

the domestic output gap and the deviation of inflation from the target would (much) later be considered as sufficient indicators of the need of policy adjustments

Now

Fast forward to the present. As noted in the opening paragraph of this section, during the past two to three years increasing attention has been given to the possibility that inflation is influenced by global factors even in the current environment of floating exchange rates and that the notion of global liquidity is useful for analytical purposes.

There are several strands to the arguments. The least controversial refers to the increased role of common shocks combined with similar reactions to such shocks by national monetary authorities. The obvious and topical example would be an increase in the prices of food and energy relative to other goods and services. If central banks react to such relative price increases in a similar manner, for example focussing on core inflation measures and thereby excluding them from the price index used in determining monetary policy responses, then the increase in headline inflation will look similar across countries.⁸ It could furthermore be described as being due to global rather than local factors.

Another uncontroversial reason for inflation to be considered a regional rather than a country-specific issue would exist if exchange rates were fixed or heavily managed. An obvious example would be a monetary union like the euro area, although even here one must be mindful of relative price changes that lead to differences in inflation rates across member economies. Less formal exchange-rate management is sometimes ascribed to many emerging and developing countries which are said to suffer from ‘fear of floating’. According to the logic of a fixed exchange rate system, such countries would import the monetary conditions set in the centre country, often the United States, and these in turn would lead to a certain commonality of inflation rates.

Neither of these two arguments implies that individual central banks could not control domestic inflation if they so desired, only that there are reasons why they choose not to. Borio and Filardo (2005) have put forward a more controversial argument according to which the ability of central banks to control inflation is reduced by globalization. They contrast the prevailing ‘country-centric’ approach in which inflation is driven only by domestic factors – the output gap and the domestic policy interest rate – with a ‘globe-centric’ approach where global factors are potentially dominant. In brief,

⁸ To the extent that central banks have output objectives as well as inflation objectives, the different impact on real income in net importing countries vs. net exporting countries would elicit differences in monetary policy responses to food and energy price shocks thereby reducing also the cross-country similarity of headline inflation rates.

their conceptual framework departs from the usual model in which economies are identified by the imperfect substitutability between goods produced at home and abroad. They instead invite us to consider a world in which goods produced in different economies are different varieties of the same differentiated good, where markets in any given location are contestable, and where production facilities and certain factors of production may be footloose. Under such conditions they argue that “a mapping between country-specific excess demand and a country’s inflation rate is not fully justified. It is global excess demand for the goods in question that is relevant.” (p. 5) In their framework, exchange rate changes do not appear to play an important role in determining inflation outcomes over a horizon that is relevant for countercyclical monetary policy. This could be due to a number of factors: the random-walk nature of exchange rate changes which appears to be out of tune with ‘fundamentals’ in the short- to medium term, the limited pass-through of exchange rate changes to prices leading to deviations from the ‘law-of-one price’, or the widespread use of hedging to make production decisions relatively insensitive to exchange rate changes.

Borio and Filardo provide empirical evidence that does not contradict their globe-centric view of the inflation process. Using a relatively traditional Phillips curve framework, they show that measures of global excess demand are as important as measures of domestic excess demand for individual countries’ inflation rates, and in some cases even more important. While they caution that their results are preliminary, they point out that the implications of the globe-centric approach for how we should model inflation and how we should think about monetary policy may be far-reaching. They note that “questions could ultimately be raised about the very effectiveness of domestic monetary policy. To the extent that, in a proximate sense, domestic inflation became increasingly influenced by global capacity constraints, this could weaken the near-term efficacy of domestic monetary policy levers, because of their limited (i.e. domestic) reach.” (p. 21) Furthermore, “[t]he power of policy could be complicated further by the implications of financial globalization, which could be weakening the ability of central banks to influence domestic real interest rates, especially longer-term rates, independently of global conditions.” (p. 21)

Time will tell whether the Borio-Filardo view will stand up to further empirical and theoretical scrutiny. In the meantime it is, I believe, an important challenge to the conventional model of the inflation process, and it suggests that when we consider monetary policy there might now be a case for distinguishing not between local vs. global monetarists but between local vs. global New Keynesians.

III. THE PROPER USE OF POLICIES UNDER FIXED AND FLEXIBLE EXCHANGE RATES

Monetary policy and the choice of exchange-rate regime

A recurring theme in Professor Swoboda's writings and in his teaching to GIIS students has been that domestic economic policy choices must be consistent with the constraints and economic logic of the exchange rate regime a country has chosen. Failing this, goals may not be reached or, worse, crises and conflicts may arise. In a fixed exchange rate context he emphasized how monetary policy could not be relied on to influence domestic income or prices other than in the short run, or using his own words: "tying monetary policy to the balance of payments is seen to be the only governing principle for monetary policy consistent with maintenance of a fixed exchange-rate system in the long run." (Swoboda (1973), p. 152.) The same article had explained how the presence of imperfect capital mobility, non-traded goods, and sticky prices did not in any way alter the basic conclusion. They only altered the speed with which the economy would reach the long-run equilibrium. An earlier article (Swoboda (1971)) had elaborated on this point by explaining why even in the complete absence of capital mobility, monetary policy would be ineffective in a fixed exchange rate context.

While the need to focus monetary policy on external balance had already been emphasized in the work of Mundell and others, the full implications were not widely recognized in the mid seventies. I recall attending many conferences in Europe (the annual Konstanz conference was one of the highlights) where there were lively debates about the relevance of the constraint on monetary policy effectiveness posed by a fixed exchange-rate regime. The implications of the monetary approach to the balance of payments was questioned by colleagues with a more closed-economy mindset, those I referred to as 'local monetarists' in the previous section. References were made to less than perfect capital mobility, portfolio-balance models of capital flows, non-traded goods etc. in these debates to argue that monetary policy could still be used to target domestic inflation even if the exchange rate was fixed. It was useful to be able to refer to Professor Swoboda's articles to counter these arguments.

The limited impact of monetary policy in a fixed exchange rate regime was drilled into many cohorts of Institute students in the obligatory open economy macro course (or 'International Monetary Economics' as it was called at the time) that Professor Swoboda (and in some years I, or in yet other years, both of us) taught. I would like to think that the lessons learned at the minimum helped in job interviews that many of the students had with the IMF which over the years led to a substantial contingent of Institute students being employed in Washington. Whether they led to better IMF programs or better monetary policies in member countries I will have to let others comment on.

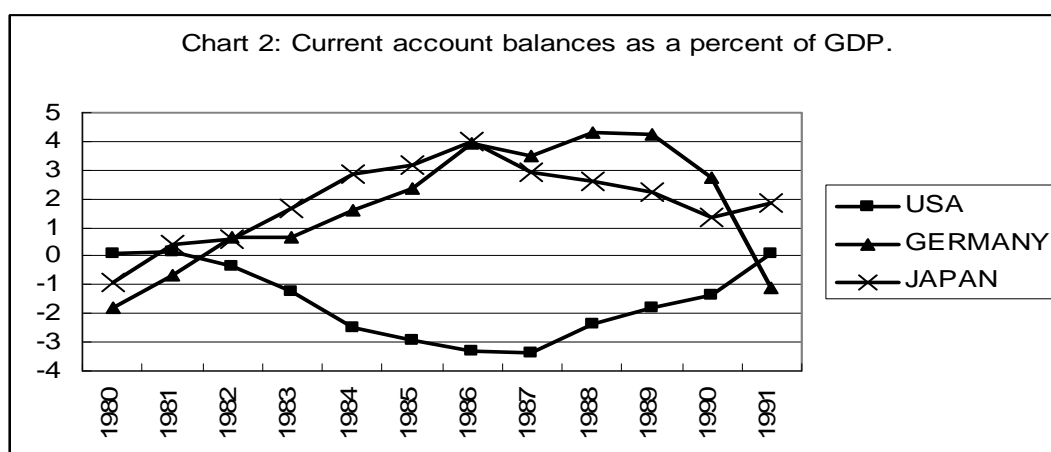
In terms of the choice of exchange rate regime the emphasis on the clear internal logic of either fixed or flexible regimes led Professor Swoboda to favour clear-cut, later called corner, solutions, i.e. either fixed rates or freely floating rates as opposed to the middle of the road solutions. In a joint paper entitled “Fixed rates, flexible rates, or the middle of the road: A re-examination of the arguments in view of recent experience” [Genberg and Swoboda (1983)] we elaborated on this view arguing that clear rules for monetary policy are necessary for any exchange rate to be performed satisfactorily, and it is easier to define such rules when the exchange rate regime is well defined. The paper was presented at one of the Wingspread conferences organized by Bob Aliber. John Williamson was there, and I recall that when he saw the title of the paper, John was hopeful that Alexander and I had finally seen the light (John believed firmly in middle-of-the-road solutions), but his opinion changed quickly when he heard our presentation.

The actual choice of exchange-rate regime by governments in the past two decades displays a tendency towards a bipolar arrangement at the two ends along a line from very hard pegs to freely floating in particular for economies with open capital accounts. [Fischer (2007)]. The bipolar arrangement has grown out of a realization by the authorities that intermediate regimes tend to experience crises of confidence and credibility, bringing on speculative attacks and their ultimate demise. Although to my knowledge Professor Swoboda did not predict the actual evolution of exchange rate regimes, his insistence that stability of a chosen regime requires strict adherence by policy makers to the logic of that regime remains as valid as ever.

Misalignment of currencies or misalignment of policies

In the 1980s

In the mid-1980s there was much discussion of the current account imbalances in the world economy. As Chart 2 illustrates, the US current account deficit increased steadily throughout the beginning of that decade from roughly balanced in the beginning to a deficit of slightly over 3% of GDP in 1986 and 1987. Corresponding surpluses were recorded in Germany and Japan in particular. As the imbalances built, questions started to be raised about their sustainability and about currency misalignment and manipulation.



Implicit, and sometimes explicit, in many policy discussions was a belief that exchange rate changes should be used to influence the current account, so it became popular to ask how far the dollar would have to fall (it had appreciated substantially during the first half of the eighties) for the current account positions to be reversed. The partial-equilibrium elasticity model was used to give answers.

The suggestion that exchange rates should be changed by intervention, by ‘talking down’ the dollar or ‘talking up’ the yen, or by other policies with the aim of influencing current account imbalances struck Professor Swoboda and me as being contrary to the proper use of economic policies under floating exchange rates. In Genberg and Swoboda (1987) we showed that in the context of the original Mundell-Fleming model the proper policy assignment under flexible exchange rates is for fiscal policy to ensure external balance (a balanced current account) and for monetary policy to ensure internal balance (price stability). We also extended the argument to a, then, more modern analytical framework which incorporated an aggregate supply as well as an aggregate demand side.⁹ By carrying out the analysis in a general equilibrium model (however simple it may seem from a current perspective) we quite naturally “emphasized ... the need to focus policy discussions on the appropriate setting of policy *instruments* and not on the values of endogenous variables [exchange rates] ... Hence, one should not ask what value of the dollar is appropriate in the light of a [current account target], but rather what are the most effective tools and what are suitable values for the implied policy instruments.” (Genberg and Swoboda (1989), p.27)

In 2008

Policy discussions surrounding the current account imbalances that have emerged in the recent past have shared many of the features of the discussions in the 1980s. Many of the early assessments made misalignment of exchange rates responsible for the imbalances, and protectionist legislation has been proposed to deal with the implied unfair competition. Also much effort went into calculating the exchange rate adjustment required to correct the US current account deficit. Under pressure from major shareholders the IMF has devoted large amounts of resources to the calculation of equilibrium exchange

⁹ Genberg and Swoboda (1989).

rates, and reports on Article IV consultations are required to contain some assessment of the appropriateness of the exchange rate level.

More recently it has been recognized that the early almost exclusive focus on exchange rate adjustment was misplaced and that one needs to discuss solutions in terms of ‘the appropriate setting of policy instruments and not the values of endogenous variables.’ Quite appropriately fiscal policies and policies that aim to influence savings behaviour directly have received most attention. One can only wonder why the emphasis on exchange rate adjustments dominated the debate for several years before a more balanced assessment appeared.

Part of the reason may be that the main watchdog of the international monetary system is hampered by a formulation of its mandate that in my view puts undue emphasis on exchange rate policy. Article IV Section 3(b) of the IMF’s Articles of Agreement states that “the Fund shall exercise firm surveillance over the exchange rate policies of members” (emphasis added). This has had as a result that the IMF has been judged on how it has carried out this particular task rather than on how it has carried out the task of “oversee[ing] the international monetary system in order to ensure its effective operation” (Articles of Agreement, Article IV, Section 3(a)). An assessment of the latter would require a more nuanced and wide-ranging analysis which focuses on the Fund’s surveillance over all aspects of economic policies, not just exchange rate policies.¹⁰ Stanley Fischer, Governor of the Bank of Israel expressed a similar opinion in his Mundell-Fleming lecture at the Eighth Annual Jacques Polak Research Conference last November. There he wondered why the new IMF Decision of Bilateral Surveillance ‘relate to “exchange rate policies that result in external instability, regardless of their purpose...” (emphasis added) rather than to “policies that result in external instability, regardless of their purpose”?’ Perhaps it is time to reformulate Article IV of the IMF’s Articles of Agreement by replacing the emphasis on exchange rate policies with a formulation of the type “the Fund shall exercise firm surveillance over the economic policies of members”.

IV. CONCLUDING REMARKS

Globalisation, global imbalances, global inflation are all terms that have been frequently used to describe important aspects of the current state of the world economy. In this brief paper I have argued that the concepts are not new and lessons from earlier analysis can be helpful in putting current concerns in perspective. Professor Alexander Swoboda at the Graduate Institute of International Studies in Geneva, Switzerland contributed important elements to that earlier analysis and the conclusions he reached are well worth keeping in mind when we contemplate solutions to current problems. This is particularly the case when we discuss choices of exchange-rate/monetary-policy regimes and when we contemplate the use of economic policies to correct international payments imbalances.

¹⁰ For a further analysis see Swoboda (2007).

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