

Treasury and Federal Reserve Foreign Exchange Operations February-July 1976

By ALAN R. HOLMES AND SCOTT E. PARDEE*

During the six-month period under review, as the authorities of industrial countries sought to deal with the cumulative effects of deep-rooted economic and financial instabilities, the exchange markets experienced several episodes of severe strain, in some cases resulting in sharply altered rate relationships among major currencies. The strains were particularly acute within Europe. Between January and the end of July, against the dollar the Italian lira depreciated by a net 20 percent, the pound by 14 percent, and the French franc—having left the European Community (EC) “snake” arrangement—by 8 percent. Maintenance of the EC snake itself entailed large-scale intervention on several occasions. Although both the German mark and the Swiss franc were often in heavy demand, on balance they appreciated by only 2 percent and 4 percent, respectively. Elsewhere the Japanese yen and the Canadian dollar each rose a net 3½ percent against the dollar.

The dollar, through its role as vehicle currency in the market and intervention currency for central banks, was only occasionally caught up in the turmoil. Thus, when the markets were particularly unsettled in February and March, the Federal Reserve sold a total of \$270.4 million of German marks and Dutch guilders, mainly financed by swap drawings. This debt, however, was quickly cleared away by mid-May. Thereafter, the Federal Reserve had no occasion to intervene in the market through

the end of July, while taking advantage of opportunities to build up modest balances.

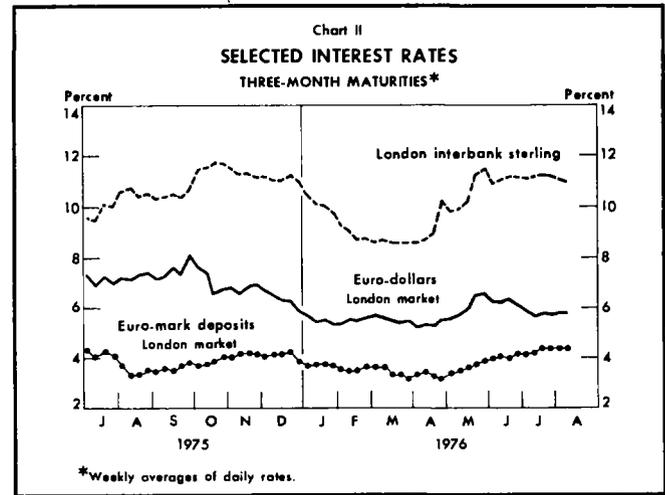
The dollar's greater resiliency, in contrast to other periods of exchange market unsettlement in recent years, largely reflected the lifting of many of the market's previous concerns over the United States economic performance. Our recovery had by early 1976 gained considerable momentum, erasing earlier fears that the upturn would falter. At the same time, the rate of inflation in the United States, already one of the lowest among major industrial countries, continued to moderate. As a sign of our underlying competitiveness in world markets, United States exports continued to rise in line with, if not faster than, the recovery of economies abroad. Although the even greater rise in imports swung the United States trade balance back into sizable deficit, the sources of this surge—the rapid rebuilding of inventories early in the year and the ballooning of fuel imports in the summer—were generally taken as further evidence of the strength of our expansion. In addition, United States interest rates were fairly steady. Since they remained well above rates in Germany and Switzerland, they helped avoid the kind of sudden shifts of funds which had occurred in other recent periods of exchange market stress. More broadly, with many other political and financial uncertainties less pressing, traders were more inclined to focus on the problems afflicting other countries.

The pressures on individual European currencies largely reflected market concern over the profound disparities in economic performance and policies among those countries. By early 1976, only a few countries were showing clear signs of sustained recovery and many European governments were still being pressed at home for further stimulus to reduce the uncomfortably high levels of unemployment. At the same time, although some progress had been made everywhere against the

* Mr. Holmes is the Executive Vice President in charge of the Foreign Function of the Federal Reserve Bank of New York and Manager, System Open Market Account. Mr. Pardee is Vice President in the Foreign Function and Deputy Manager for Foreign Operations of the System Open Market Account. The Bank acts as agent for both the Treasury and the Federal Reserve System in the conduct of foreign exchange operations.

inflationary excesses of the earlier 1970's, large differentials in inflation rates remained, with Switzerland and Germany at the low end of the spectrum and Italy and the United Kingdom at the high end. To the market, the persistence of differential trends in production and prices threatened to distort competitive relationships and thus eventually to lead to further exchange rate adjustments. Market participants, uncertain of the timing and extent of potential adjustments, feared that a significant movement in any European currency rate might set off a chain reaction in other rates as well. Consequently, each time pressures developed in one currency or another—whether that currency was floating alone or linked to others in the EC snake—the whole array of European currency relationships became open to question. On these occasions, traders hastened to take speculative positions or to hedge exposures and, in this rush to buy or sell individual currencies, the markets frequently became one-sided.

These episodes presented harsh policy choices to the authorities. For those whose currencies came into heavy demand, to allow the exchange rate to appreciate risked stifling exports at a time of domestic concern over unemployment, while to hold the rate through intervention risked rekindling inflation through excessive domestic monetary expansion. For others whose currencies came under heavy selling pressure, to support the rate through measures such as monetary restraints risked delaying or aborting economic recovery, while to permit the exchange

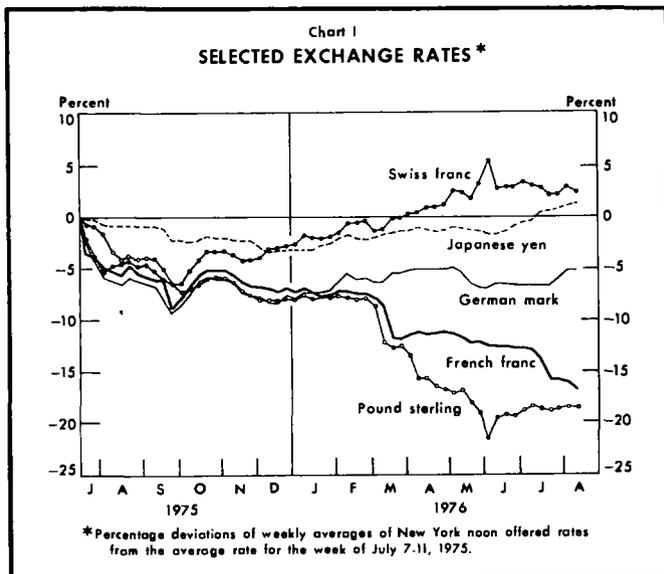


rate to fall sharply risked exacerbating inflationary pressures through the higher cost of imports. For many, these difficulties were compounded by political uncertainties and by concerns over labor relations. Consequently, as recounted in the body of this report, the national authorities responded with a variety of short-term measures to deal with the immediate exchange market pressures while seeking to establish a framework for greater stability over the long run.

During the period under review, the United States authorities provided assistance, in the form of short-term credits, to the Bank of Italy, the Bank of Mexico, and the Bank of England. With Italy, the Federal Reserve swap arrangement had already been reactivated in January by a drawing of \$250 million, and the Bank of Italy drew a further \$250 million in March. When market reflows into lire developed in the early summer, these drawings were completely repaid in July.

With Mexico, in early April the Bank of Mexico drew the full \$360 million available under its swap line with the Federal Reserve. That drawing remained outstanding at the end of July.

With the United Kingdom, in early June the United States authorities agreed to provide up to \$2 billion to the Bank of England as part of a \$5.3 billion total international standby credit facility. As in several credits extended by the United States authorities in the past, both the Federal Reserve and the United States Treasury participated, each standing ready to provide \$1 billion. The availability from the Federal Reserve was under the existing \$3 billion swap arrangement. The Treasury's



credit line, also in the form of a short-term swap facility, was for the account of its Exchange Stabilization Fund. By end-July, in proportion to the Bank of England's borrowings from other countries participating in the facility, the drawings on the Federal Reserve and the Treasury each amounted to \$200 million.

To summarize other Federal Reserve operations, the System sales of German marks in February and March amounted to \$250.8 million, of which \$133.9 million was drawn under the swap arrangement with the German Bundesbank and the remainder from balances. Purchases of marks amounted to \$265.6 million, which was used to repay the swap drawings by mid-May and to replenish balances. Sales of Netherlands guilders in February amounted to \$19.6 million, drawn under the swap line with the Netherlands Bank. Purchases of guilders amounted to \$23.0 million, also to repay the swap drawing and to add to balances.

With respect to obligations outstanding since August 1971, the Federal Reserve purchased \$177.3 million of Belgian francs and used most of these francs to liquidate a further \$170.5 million of the franc-denominated debt to

the National Bank of Belgium and to reduce the total to \$82.4 million equivalent. The Federal Reserve in February transferred its \$600 million of Swiss-franc swap debt from the Bank for International Settlements (BIS) to the Swiss National Bank. During the period, the System purchased \$33.2 million equivalent of Swiss francs from correspondents and liquidated \$20 million of its debt with the Swiss central bank. This reduced commitments to \$1,147.2 million, which remained outstanding as of end-July. The United States Treasury's \$1,599.3 million of medium-term Swiss franc-denominated obligations to the Swiss National Bank was unchanged during the February-July 1976 period.

GERMAN MARK

By early 1976, the German economic recovery had begun to catch up with the earlier turnaround in the United States, with the initial impulse having been provided by domestic consumption and exports. At the same time, the rapid increase in German foreign orders suggested to many market participants that export growth would keep pace with a predicted rise in imports, thereby enabling Germany to hold on this year to most of its \$3.8 billion 1975 current-account surplus, unlike other countries for which deficits were expected. As for wages and prices, Germany continued to record one of the lowest inflation rates in the industrialized world. At 5 percent per annum, the increase in consumer prices was just about half that of neighboring EC countries, while pay awards in recently negotiated union contracts in Germany remained moderate. When announcing its monetary growth target for 1976, the Bundesbank had stressed that the authorities would continue to attach a high priority to keeping a tight rein on inflation. If as a result German interest rates turned higher later in the year, the market saw the potential for reversal of the heavy volume of funds placed abroad by German banks in 1975.

The improving economic trends in Germany seemed more favorable than indications of price, output, and external payments performances suggested for other EC countries. Thus, by late January, following a sharp decline in the Italian lira and a rapid buildup of speculative selling pressures against the French and Belgian francs, dealers began to question whether the mark, still relatively weak within the EC snake, should not strengthen against other European currencies. Speculative funds were increasingly shifted into marks. Consequently, the mark rate moved up steadily against those European currencies and then against the dollar as well. By January 30 the mark had been bid up to \$0.3868, 1½ percent above its

Table I
FEDERAL RESERVE RECIPROCAL CURRENCY ARRANGEMENTS
In millions of dollars

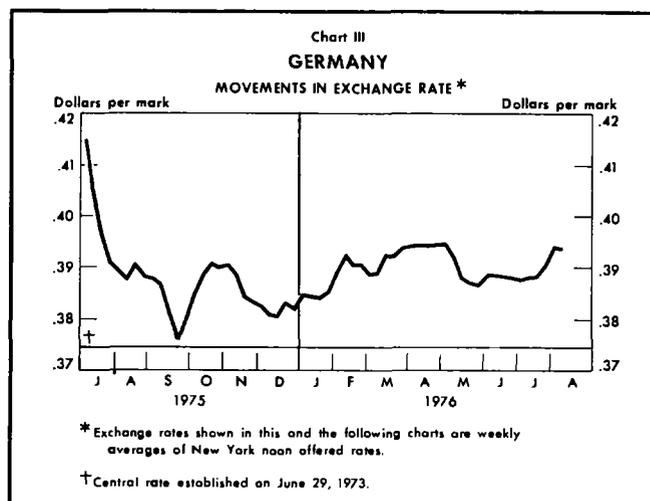
Institution	Amount of facility July 31, 1976
Austrian National Bank	250
National Bank of Belgium	1,000
Bank of Canada	2,000
National Bank of Denmark	250
Bank of England.....	3,000
Bank of France	2,000
German Federal Bank	2,000
Bank of Italy	3,000
Bank of Japan	2,000
Bank of Mexico	360
Netherlands Bank	500
Bank of Norway	250
Bank of Sweden	300
Swiss National Bank	1,400
Bank for International Settlements:	
Swiss francs-dollars	600
Other authorized European currencies-dollars	1,250
Total	20,160

late-1975 low, in occasionally unsettled trading.

By early February the movement of funds into the mark gathered momentum, as rumors of a realignment of currencies within the EC snake, possibly including a revaluation of the mark, surfaced in the market. By Monday, February 9, the continued weakness of the French franc and Italian lira, news of a devaluation of the Spanish peseta, and press reports that an EC currency realignment would be discussed at the upcoming meeting between German Chancellor Schmidt and French President Giscard d'Estaing provoked talk of an imminent mark revaluation. Despite firm official denials of any intention to revalue, the already broad-based bidding for marks quickly intensified. The mark was driven up $2\frac{1}{4}$ percent higher from end-January levels to \$0.3955 against the dollar and, for the first time since November 1974, to the top of the EC snake. As the advance of the mark extended the band to its full limit of $2\frac{1}{4}$ percent against the French franc, market participants rushed to take advantage of the emerging two-way speculative opportunity, thereby aggravating pressure on the franc. In response, the French and German central banks stepped up their intervention to defend the limits of the snake, in dollars and in each other's currency as well. Occasionally, the unsettled trading conditions in Europe washed over into the New York market. Thus, the Federal Reserve intervened on four days during February 2-11 to sell a total of \$137.4 million equivalent of marks, financed by \$80.9 million of drawings under the swap arrangement with the Bundesbank and by use of existing balances.

By February 13, the mark had begun to ease back against the dollar and to move away from the upper limit of the EC snake in the wake of this concerted central bank intervention and in response to statements emerging from the Franco-German summit reaffirming existing EC parities. Through the month end, the mark continued to settle back except for two occasions, February 19 and February 27, when the market was again briefly unsettled in New York. On these two days, the Federal Reserve sold \$15.8 million equivalent of marks from balances. Otherwise, as trading conditions continued generally to improve, the System was able to purchase \$65.2 million of marks in the market and from correspondents through early March, using part of these acquisitions to repay \$26.4 million equivalent of the recently incurred swap indebtedness with the Bundesbank.

On March 4, the mark was trading quietly around \$0.3880 when a sudden, sharp decline in sterling prompted renewed concern over the viability of existing European currency relationships. After the European close the next day, as some of the funds moving from



sterling into dollars were in turn switched into marks, the mark was pushed up by over $\frac{1}{2}$ percent against the dollar and again to its upper limit against the French franc in the EC band. This polarization of the snake made trading conditions hectic once more. To help settle the market in New York, the Federal Reserve sold \$40.1 million of marks, of which \$29.6 million was from balances and \$10.5 million was financed by a further drawing on the swap line. The mark and French franc remained under almost continuous pressure at the opposite limits of the joint float during the following week, and both the Bundesbank and the Bank of France continued to intervene heavily in each other's currency. Against the dollar the mark held fairly steady until Friday, March 12, when, amid unsettled pre-weekend trading prior to an EC finance ministers' meeting, the mark again came into heavy demand in New York. The Federal Reserve then sold another \$12.7 million of marks, financed by a swap drawing.

Following consultations over the March 13-14 weekend among the EC finance ministers, the French government decided to withdraw the franc from the EC snake, while the Dutch and Belgian authorities announced the suspension of the Benelux currency arrangement. In subsequent disclosures in the press, it was reported that Germany had been prepared to revalue the mark as part of a broad realignment of snake parities which, in the end, could not be worked out. These disclosures made dealers all the more convinced that the mark would be either unilaterally revalued within the EC snake or allowed to float independently. Therefore, when the market reopened on the

morning of March 15, the mark began to rise against the dollar, pulling the remaining EC currencies up in its wake. In an attempt to maintain orderly markets, the Bundesbank bought substantial amounts of dollars as well as Belgian francs, Danish kroner, and Norwegian kroner through March 19. This intervention contributed to the \$3.7 billion increase in Germany's foreign exchange reserves in February and March. The pressures on the mark also spilled over into the New York market. Consequently, over March 16-17 the Federal Reserve sold \$34.9 million equivalent of marks. Of this, \$29.8 million was drawn under the swap line, raising outstanding drawings since February to a peak of \$107.5 million, and the remainder was from balances.

The tensions within the snake began to dissipate following the March 20-21 weekend, as the German government again expressed its commitment to maintaining the existing mark parity within the snake. Against the dollar the mark snapped higher before the quarter end, as German commercial banks bid for marks to meet reserve requirements and traders positioned for the end of an accounting period. After the Bundesbank purchased a small amount of dollars at the Frankfurt fixing on March 30 and the Federal Reserve sold \$9.9 million equivalent of marks from balances later that day, the market quieted. The spot rate then leveled off to trade around \$0.3945 throughout

April, some 2 percent above end-January levels. Meanwhile, as funds began to flow back out of Germany, the Federal Reserve acquired sufficient marks to repay \$27.5 million of its swap debt with the Bundesbank, reducing the total outstanding to \$80 million.

During the spring, economic statistics were reinforcing the market's view that the German and American recoveries were becoming more nearly synchronized and that the moderating trend of inflation in both countries was continuing. Thus, day-to-day movements in the mark rate depended largely on relative money market conditions. As the German government drew down during April and May balances that had been built up at the Bundesbank, the money market became liquid and remained comfortable even after the Bundesbank announced a two-stage increase in required reserves effective May 1 and June 1. By comparison, United States money market rates turned up somewhat in late April. As a result of these divergent tendencies, the mark slipped back gradually against the dollar during May, declining 2½ percent to \$0.3849 by the beginning of June. Taking advantage of the dollar's buoyancy, the Federal Reserve acquired marks in the market and from correspondents sufficient to repay the remaining \$80 million swap debt with the Bundesbank and to restore modest working balances.

Meanwhile, some dealers also moved to unwind long-

Table II
FEDERAL RESERVE SYSTEM DRAWINGS AND REPAYMENTS
UNDER RECIPROCAL CURRENCY ARRANGEMENTS

In millions of dollars equivalent

Transactions with	System swap commitments, January 1, 1976	Drawings (+) or repayments (-)			System swap commitments, July 31, 1976
		1976			
		I	II	July	
National Bank of Belgium	297.6	- 86.5	- 83.7	-45.0	82.4
German Federal Bank	-0-	{+133.9 - 26.4	-107.5		-0-
Netherlands Bank	-0-	{+ 19.6 - 19.6			-0-
Swiss National Bank	567.2	{+600.0* - 20.0			1,147.2
Bank for International Settlements (Swiss francs)	600.0	-600.0*			-0-
Total	1,464.8	{+753.5 -752.6	-191.2	-45.0	1,229.6

Note: Discrepancies in totals are due to rounding.

* Consolidation of Swiss-franc swap debt.

standing positions in marks against other European currencies. Thus, as short-term funds flowed back out of Germany, other central banks participating in the EC snake bought marks to repay much of their commitments with the Bundesbank. Nevertheless, the mark edged lower in the snake and also dropped as much as 8 percent to a record low against the Swiss franc by early June. To stem the erosion of the mark rate against the Swiss franc as well as to facilitate the further financing of the German government's budget deficit, the German government arranged with the Swiss authorities to place a mark-denominated borrowing of DM 750 million with the three major Swiss commercial banks. As dealers positioned for potential mark purchases against sales of Swiss francs ahead of the June 15 payment date for this loan, the mark rate was temporarily bid up to as high as \$0.3908. It soon settled back to trade between \$0.3875 and \$0.3890 in well-balanced trading until late in the period.

By summer, economic indicators showed that both the German and United States economic expansions had slowed somewhat in the second quarter. At first, these reports were largely offsetting in their impact on market psychology. But toward the end of July, this news was accompanied by gradual declines in United States short-term interest rates that contrasted with gently rising money market rates in Germany. Moreover, the market was increasingly aware of German public sector borrowing abroad. Then, sizable buy orders for marks prompted a sharp rise in the spot rate just before the month end. This unexpected advance after a long period of steadiness soon attracted professional demand for marks and a recurrence of pressure on the EC snake. In sometimes hectic trading, the rate jumped 1¾ percent in two days to \$0.3952 by July 30, some 2 percent above end-January levels.

STERLING

In contrast to most other EC currencies, sterling remained fairly steady in early 1976. By that time the exchange market's previous extreme pessimism over prospects for the pound had lifted somewhat. The wage restraint program adopted in midsummer 1975 had already showed positive results in slowing Britain's severe wage-price spiral. The nearly 13½ percent depreciation of sterling over the whole year 1975 had left British exports fairly competitive. Although the British economy was still in deep recession, the economies of most major trading partners were well into recovery and an export-led upturn for the United Kingdom was a distinct possibility. In the meantime, large interest rate differentials favoring the pound stimulated sizable placements in both short-

and long-term sterling instruments, thereby offsetting the continuing current-account deficit.

Consequently, even as other European currencies were buffeted by heavy divergent pressures in January and February, sterling traded narrowly just above \$2.0250 against the dollar through early March. Over the same period, its effective depreciation since the December 1971 Smithsonian agreement, having held steady around 30 percent through early February, rose to around 30.5 percent before falling again to around 30.1 percent in early March. The Bank of England, intervening to avoid sharp movements in the rate either up or down, was able to accumulate a modest amount of dollars from market operations in January-February which, together with public sector borrowings and a \$1.2 billion drawing on the International Monetary Fund (IMF) oil facility, contributed to a \$1.6 billion increase in Britain's reserves over the two months. As this generally more favorable exchange market atmosphere emerged at the turn of the year, the United Kingdom authorities allowed interest rates to ease in an attempt to stimulate domestic investment spending and thereby to reduce unemployment. The Bank of England's minimum lending rate had been gradually reduced from its peak of 12 percent in November 1975 to 9¼ percent by late February, with scope for even further reduction on the basis of market interest rates in early March.

Sterling's stability nevertheless clearly rested on fragile underpinnings. Although heartened by the results of the wage restraint program, many traders remained skeptical that the first year's phase would meet its full objectives and that the next phase, still to be negotiated, would be sufficient to achieve lasting improvement. Moreover, the very depth and prolongation of the recession in Britain raised concerns in the market that the government would eventually shift to a more stimulative fiscal policy, possibly in the budget to be announced in April. Furthermore, in the context of massive speculation over relationships among other European currencies, the fact that Britain continued to have one of the highest inflation rates among industrial nations—running by then at 15 percent per annum—led most market participants to expect that sooner or later the pound would undergo a further downward adjustment.

Against this background, the market atmosphere changed abruptly in a swiftly moving sequence of events beginning on March 4. On that day the United Kingdom authorities, confronted with a substantial but short-lived bunching of commercial orders in the marketplace, intervened to supply sterling and absorb dollars to avoid a potentially unsustainable appreciation of sterling above prevailing levels. Once these demands were met, however,

sterling came on offer so suddenly that many market participants concluded that the authorities had acted to depress the rate. Heavy selling pressure emerged the next day in Europe, and sterling plunged with little market resistance through the \$2.00 level. On that day also, the minimum lending rate was reduced by a further $\frac{1}{4}$ percentage point to 9 percent. That weekend, sterling's breach of the \$2.00 bench mark was featured in press and television news commentary around the world. Widespread selling of pounds resumed on Monday, March 8, and sterling fell nearly ten cents to below \$1.93 before edging back late in the day to trade around \$1.9425. Meanwhile, the Bank of England had intervened heavily to moderate the decline.

This precipitous drop of over 4 percent in three trading days left the market badly shaken. With the pound now vulnerable to further downward pressure, it was soon caught up fully in the interplay of speculative forces besetting other EC currencies. Commercial leads and lags shifted abruptly against sterling as did the flow of non-resident investment funds. Various uncertainties were injected into the market by Prime Minister Wilson's unexpected resignation and the ensuing struggle within the Labour Party from which Mr. Callaghan emerged as successor, the wide range of public pronouncements on Britain's policy choices by economic analysts and spokesmen for different interest groups, and the continuing unrest on the labor front. These concerns heightened the market's anticipation of the budget address, scheduled for April 6. Although sterling leveled off just above \$1.90 toward end-March, a new wave of precautionary selling drove the rate down by a further 3 percent to \$1.85 in early April.

In framing the budget message, the United Kingdom government addressed many of the issues which troubled the market. Among other measures, Chancellor Healey announced a proposal to provide tax relief to the nation as a whole on the condition that, in the second phase of the pay policy, the trade unions accept even more severe restraints on wage increases than before. As the government and the trade union leadership pressed ahead with their negotiations, the sterling market reacted nervously to each twist and turn in the highly publicized bargaining process. Meanwhile, the pound's already sharp slide, increasingly less favorable interest rate differentials for sterling, and reserve needs for some sterling holders prompted many to continue to disinvest their sterling assets or switch into other currencies. This process added to the drag on the spot rate for sterling and to the drain on British reserves, as the Bank of England intervened to sell substantial amounts of dollars to cushion the pound's decline. As a result, United Kingdom reserves dropped a full \$2.2 billion during March-April, even after the receipt of \$600 million of public sector borrowings.

In a sharp reversal of policy, the Bank of England began to tighten money market rates, hiking its minimum lending rate $1\frac{1}{2}$ percentage points to $10\frac{1}{2}$ percent on April 26 and following up with another 1 percent increase on May 24. Moreover, on May 5, the government announced successful completion of the wage policy negotiations with the Trades Union Congress. In exchange for the tax cut, the government had secured agreement from the union movement's leadership to limit phase-two wage increases, beginning on August 1, to 4.5 percent per annum under a formula which came close to the terms set forth in the budget address. Also, to bolster cash reserves, in early May the United Kingdom authorities announced that they would take down a further \$806 million from the IMF, under a previously arranged first-credit-tranche standby.

Nevertheless, during May the market became so thoroughly demoralized that favorable developments were virtually ignored, or greeted with skepticism, while traders reacted quickly to anything which might conceivably affect sterling adversely. News reports that particular trade unions might possibly reject the negotiated limitations on wage increases and further bits of unfavorable economic news—the unexpected increase in the April trade deficit, the sharp rise in April retail prices, the decline in United Kingdom industrial production in March—sparked renewed selling of sterling. As the rate continued to plunge, dealers expressed open concern over the willingness or the ability of the authorities to halt the slide. Consequently, even as the Bank of England

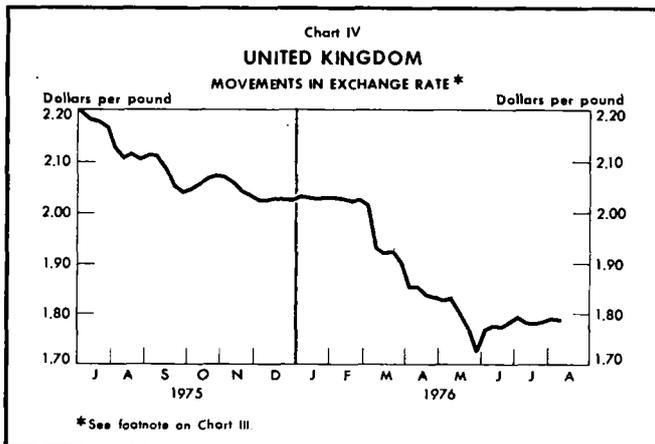


Table III
DRAWINGS AND REPAYMENTS BY FOREIGN CENTRAL BANKS
AND THE BANK FOR INTERNATIONAL SETTLEMENTS
UNDER RECIPROCAL CURRENCY ARRANGEMENTS

In millions of dollars

Banks drawing on Federal Reserve System	Drawings on Federal Reserve System outstanding January 1, 1976	Drawings (+) or repayments (-)			Drawings on Federal Reserve System outstanding July 31, 1976
		1976			
		I	II	July	
Bank of England	-0-		+200.0		200.0
Bank of Italy	-0-	+500.0		-500.0	-0-
Bank of Mexico	-0-		+360.0		360.0
Bank for International Settlements (against German marks)	-0-		{+ 14.0 - 14.0	{+ 37.0 - 37.0	-0-
Total	-0-	+500.0	{+574.0 - 14.0	{+ 37.0 -337.0	560.0

provided further support—official reserves declined by \$250 million in May net of the IMF drawing—the pound dropped through \$1.80 to \$1.75 by end-May and plummeted to as low as \$1.7020 in the first week of June. This represented a drop from early March of 15¾ percent against the dollar and 11.8 percentage points to 41.9 percent on an effective trade-weighted basis since the December 1975 Smithsonian agreement.

Meanwhile, Chancellor of the Exchequer Healey and other government spokesmen expressed the firm view that the various measures taken so far would achieve the greater price stability and improved productivity necessary to strengthen sterling over the long run. Indeed, the wage restraint program negotiated with the Trades Union Congress was by that time gaining acceptance in votes among individual unions. To deal with the immediate concerns of the exchange market, however, the United Kingdom authorities began in early June to discuss short-term credit availability with foreign central banks and governments.

From those discussions, largely conducted over the weekend of June 5-6, emerged a \$5.3 billion package of standby credits to the United Kingdom from the Group of Ten countries plus Switzerland and the BIS. As part of the package, the Federal Reserve stood ready to make available up to \$1 billion under the swap arrangement with the Bank of England and the United States Treasury up

to \$1 billion through the Exchange Stabilization Fund. In announcing the United States participation, the United States Treasury and the Federal Reserve said: "These arrangements have been made in the light of the recent fall in the value of the pound sterling under exchange market pressures which have led to disorderly market conditions, and in the common interest in the stability and efficient functioning of the international monetary system."

Announcement of the standby credit was carried by the news services shortly after 10:30 a.m. New York time, at which point the Bank of England and the Federal Reserve Bank of New York, as its agent, simultaneously entered their respective markets, bidding openly for sterling at the current rate of exchange. The combined force of the news and the central bank presence in the market had an electrifying effect. Within a matter of minutes and with only a nominal purchase of sterling by the authorities before they withdrew to the sidelines, the spot rate shot upward in a rise which carried it to \$1.80 by the time the London market reopened the following morning. However, the market quickly sought to test the determination of the British authorities to support the rate at prevailing levels. As sterling dropped back to around \$1.77, the Bank of England countered with substantial dollar sales, both in London and through this Bank in New York, while reinforcing a liquidity squeeze by operating in the market for short-dated swaps. These operations helped

stabilize the pound somewhat, and over subsequent days fairly good two-way business was again moving through the market.

Nevertheless, dealers continued to look for new domestic policy initiatives to cut public expenditures and to restrict monetary growth, as well as evidence of an underlying improvement in British economic performance. Consequently, sterling remained vulnerable to an occasional burst of selling pressure and on individual days official support for the pound was quite heavy. By end-June, the spot rate was around \$1.77 and intervention had diminished considerably. To offset outflows from reserves resulting from recent intervention operations, the Bank of England drew in late June on the standby facility. In this connection, it took down \$200 million on the swap line with the Federal Reserve and \$200 million from the Exchange Stabilization Fund.

During July, the sterling market gradually became less fragile and rate movements progressively narrowed. Evidence of a more firmly based economic recovery began to appear. Moreover, the British government announced details of a reduction in public sector expenditure for the 1977-78 fiscal year to free more resources for exports and industrial investment. Although the market initially reacted with some disappointment that these measures were not stronger, trading conditions soon improved. By end-July the pound had settled around \$1.78, some 4½ percent above the early-June low. Meanwhile, the effective trade-weighted depreciation had improved to 38.8 percent.

SWISS FRANC

Coming into 1976, the market's attitude toward the Swiss franc was even more bullish than before. Switzerland's inflation rate had declined to below 3½ percent per annum, a striking improvement from the 10 percent rate that had prevailed just twelve months before and well below rates elsewhere. The current-account balance was in exceptionally strong surplus and, with domestic demand still stagnant and showing few signs of an early recovery, was expected to remain favorable well into the new year. Although Swiss interest rates had been kept low and the outflow of capital was swollen with greatly increased nonresident borrowings in Swiss francs, the market was concerned over the potential demand for francs that could arise whenever borrowers covered themselves. Indeed, a number of market participants with recent and long-standing debts in Swiss francs moved to cover their franc exposures in early January. The franc, therefore, came into strong demand, rising through the month end

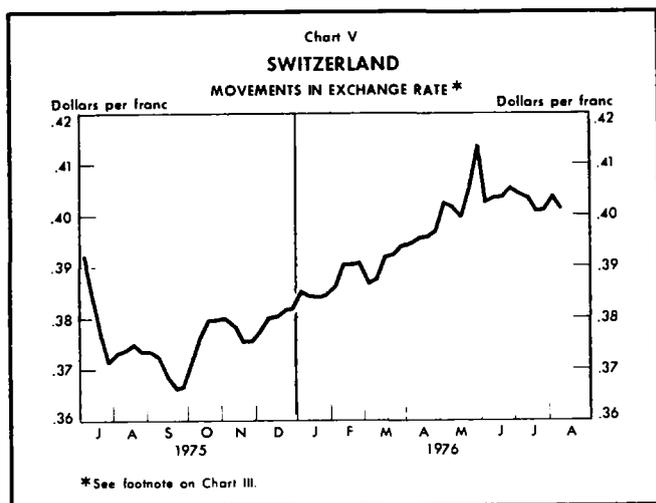
by some 5½ percent from its September 1975 low to \$0.3844 against the dollar while reaching par against the German mark.

In the meantime, the Swiss authorities, concerned about the eventual adverse effects of a strengthening exchange rate on Swiss exports, took steps to limit the franc's rise. The official discount and Lombard rates were reduced further to 2½ percent and 3½ percent, respectively, in early January. In addition, the National Bank stepped up its official purchases of dollars in Zurich and, to a modest extent, in New York through this Bank as agent. To avoid jeopardizing the authorities' monetary target for the year, these operations were offset in part by the ongoing program requiring foreign borrowers of Swiss francs to convert the proceeds of their borrowings at the central bank and in part by increased government borrowings.

Although by early February the particular demands for Swiss francs had largely been met, the franc soon was caught up in the tensions afflicting other currencies in mid-February and early March. Marked up against the dollar in sympathy with the rise of the German mark, the rate increased to \$0.3970 on March 17, even as the National Bank continued to intervene. After pressures within the EC snake began to subside late in March, the Swiss franc remained in demand in response to the usual quarter-end needs for francs. The National Bank provided liquidity assistance, mostly through swaps over the month end but also through further outright spot dollar purchases, with the result that the spot rate held steady against the dollar and around par with the German mark.

Early in April, however, the Swiss franc once again emerged as a focus of market attention, rising strongly not only against the dollar but also against the German mark. Recent economic indicators confirmed the further moderation of price increases in Switzerland as well as the continued strength of the current-account surplus. Switzerland once again provided a haven for those funds seeking an escape from the continued uncertainties elsewhere, and the franc was bid up strongly as funds were shifted out of Italian lire and sterling. Renewed hedging of long-term Swiss-franc commitments by United States and other corporations, periodic inflows from the Organization of Petroleum Exporting Countries (OPEC), eastern Europe, and third world countries, and outright speculative positioning further reinforced demand for Swiss francs.

In view of these continuing sources of strength, the market became fearful that the authorities would again seek to contain the franc's rise by imposing yet more controls against the inflow of foreign funds. The announcement early in April of new regulations restricting the importation of foreign bank notes seemed to confirm the



market's concern, and the franc again became strongly bid. The Swiss National Bank continued to purchase dollars in the market to contain the franc's rise. At the same time, however, National Bank President Leutwiler conceded that neither the balance-of-payments nor cost-price relationships warranted a restoration of earlier rates for the franc. Thus, the franc was subjected to successive waves of demand that swept the spot rate up by June 2 to a peak of \$0.4197, 9 percent above late-January levels and its highest point since early 1975. In the meantime, the franc gained some 8 percent to a record high against the German mark.

The protracted rise of the Swiss franc threatened to aggravate the pressures on Swiss exporters at a time when the domestic economy still had not joined in the economic recovery developing elsewhere. In response, the Swiss authorities prepared to stiffen their resistance to the franc's advance. They agreed that a DM 750 million loan for the German government be placed with the three major Swiss commercial banks and that the marks be purchased in the market. On June 8 the Swiss National Bank announced an extensive package of exchange controls and other measures to curb the "excessive speculation that led to the Swiss franc's clear overvaluation". In addition, the authorities pledged to "intervene massively, if necessary, to correct disorderly exchange rate movements", blocking the Swiss franc countervalue of their dollar purchases if needed to avoid undermining Swiss monetary targets. Moreover, the Swiss central bank again cut both its discount and Lombard rates to 2 percent and

3 percent, respectively, the lowest levels since 1963.

Following these actions, the Swiss authorities immediately stepped up the scale of their intervention in both dollars and German marks. As the market assessed the impact of this heavier intervention and the German government borrowing on the franc-mark relationship, dealers moved to cut back some of their large Swiss franc positions. The franc therefore fell back 5½ percent against the dollar to \$0.3960 on June 9, while dropping a similar amount against the German mark. As the Swiss franc weakened, some of the banks and multinational corporations with exposures in francs took advantage of these rates to begin again to cover themselves. Moreover, sales of Swiss francs to finance participations in the German government loan soon tapered off. As a result, demand for francs reemerged and remained periodically heavy over subsequent days, with the National Bank providing resistance to a further sharp rise in the rate.

By the end of June, the Swiss National Bank had purchased a total of \$4.4 billion since the beginning of the year. During the first quarter, the bulk of the spot intervention had been offset, largely under the capital export conversion program, and the National Bank had provided temporary liquidity partly by conducting short-term swaps with the Swiss banks. During the second quarter, however, a smaller portion of the reserves injected through the Swiss National Bank's intervention was absorbed and the Swiss money market became increasingly liquid. To help keep monetary expansion in line with the National Bank's target, reserve requirements on foreign deposits were raised, effective July 26, and government borrowings were stepped up. But even so, Swiss interest rates remained extremely low in sharp contrast to the somewhat firmer tendencies that developed from time to time in other centers.

Consequently, the Swiss franc leveled off to trade more narrowly around \$0.4038 during most of July. Just before the month end, however, it was pulled up somewhat by the German mark's advance. As a result, by July 30, the franc was on balance somewhat more than 4 percent above end-January levels but still 3¾ percent below its peak of early June. Against the German mark, it had gained 2½ percent on balance over the period, though the gap between the two currencies had narrowed some 5½ percent from its widest point two months before.

During the period, the Federal Reserve transferred its \$600 million of Swiss franc swap debt from the BIS to the Swiss National Bank. The System purchased \$33.2 million equivalent of Swiss francs from correspondents and liquidated \$20 million of its debt with the Swiss central bank. Swiss franc commitments outstanding at end-July totaled \$1,147.2 million.

FRENCH FRANC

During much of 1975, the French franc was bolstered by a strong improvement in France's external position. A severe recession at home and reduced energy requirements helped to swing France's trade account into surplus. Relatively high interest rates in France had stimulated sizable inflows of foreign funds, while French companies had been encouraged to borrow abroad. Thus, the French franc remained relatively firm within the EC snake after its reentry at the former parity in July 1975. The Bank of France intervened frequently to keep the franc off the top of the EC band, with the official purchases reflected in the increase in French reserves recorded for the second half of 1975.

By the turn of the year, however, the balance of market forces began to turn against the French franc. The fiscal stimulus provided early last fall, when the recovery in France—as in other European countries—was still lagging behind that in the United States, had by then generated a quick rebound in the domestic economy. This drew imports in from abroad sufficient to turn France's trade position back into deficit by late 1975. It also raised market concern over whether the inflation rate, which had eased just below 10 percent, would continue to decline toward levels more nearly in line with those in Germany and the United States. In the meantime, domestic interest rates eased back somewhat, thereby narrowing the interest differentials favoring France. As credit conditions improved, French companies repaid some of their previous foreign borrowings while new borrowings abroad declined.

With the outlook for France's balance of payments more uncertain, the French franc was left exposed to the

successive waves of selling which developed in early 1976. Following the January 21 suspension of official support for the Italian lira and its subsequent sharp drop, the market increasingly came to question the competitive relationships within Europe and the viability of existing EC parities. As a result, the French franc had already come on offer late in January when dealers unloaded long French franc positions and leads and lags shifted against the franc. As the franc weakened, it dropped below the midpoint of the EC snake. The Bank of France intervened to cushion its decline by selling dollars heavily in Paris and limited amounts in New York with the Federal Reserve Bank of New York acting as its agent.

Nevertheless, speculative pressures within the EC monetary agreement continued to mount as repeated rumors of a possible realignment of snake currencies—involving some combination of a franc devaluation and a German mark revaluation—swept through the markets. Consequently, the franc and the mark were pushed toward the opposite extremes of the joint float by the second week of February. The February 9 devaluation of the Spanish peseta and the approach of a scheduled Franco-German summit meeting on February 12-13, reportedly to discuss among other things an EC currency realignment, further intensified the two-way speculation within the snake. In response, the Bank of France stepped up the scale of its operations, selling large amounts of dollars as well as a substantial sum of German marks between February 9 and February 12. At the same time, in Frankfurt; the Bundesbank followed up on its dollar purchases with some French franc acquisitions to help keep the franc above the floor of the snake.

Table IV
UNITED STATES TREASURY SECURITIES
FOREIGN CURRENCY SERIES

In millions of dollars equivalent

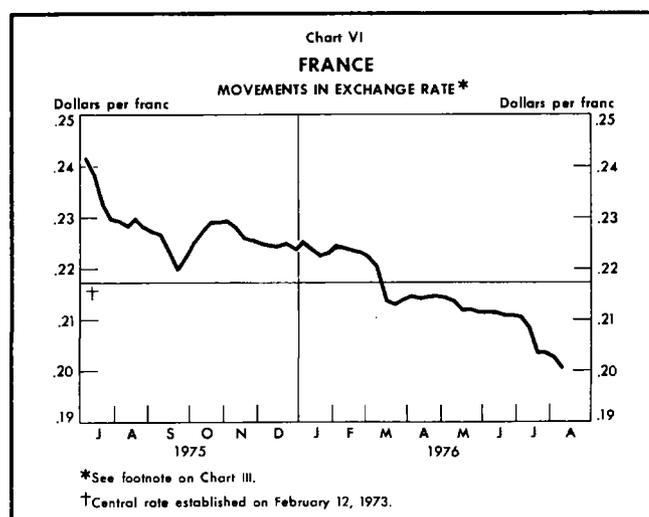
Issued to	Amount outstanding January 1, 1976	Issues (+) or redemptions (-)			Amount outstanding July 31, 1976
		1976			
		I	II	July	
Swiss National Bank	1,599.3				1,599.3
Total	1,599.3	-0-	-0-	-0-	1,599.3

In the wake of this officially acknowledged intervention, the markets began to settle down by February 13. Moreover, reports from that weekend's summit meeting reaffirming prevailing EC parities, together with a tightening of French interest rates, prompted some covering of short franc positions. As a result, the franc regained a portion of the ground it had lost against the mark and later eased back less than other Continental currencies as the dollar generally firmed. By the month end, it had declined against the dollar some $\frac{1}{2}$ percent from early-February levels to \$0.2234. Against other European currencies, however, it had firmed to a level $\frac{3}{4}$ percent above the floor of the EC snake, and the Bank of France began to recoup some of its reserve losses.

Nevertheless, most market participants remained convinced that an early realignment of EC parities was inevitable. Thus, when sterling's sharp decline in early March and the continuing plunge of the Italian lira again brought into question competitive relationships within Europe, a new and more virulent round of speculation against the franc was quickly ignited. In the wake of these precipitous declines in exchange rates for two of France's major trading partners, the French franc came under massive pressure, as commercial and professional market participants offered huge amounts of francs in the exchanges at the same time that the German mark was strongly bid. Leads and lags shifted even more heavily against the franc, and the large-scale speculative positions established during January and February were lengthened even further. The Bank of France met these pressures with further forceful intervention that resulted in a considerable loss of French reserves for the several days that preceded the March 13-14 meeting of EC finance ministers.

Over the weekend, when no realignment within the EC snake was achieved at the summit meeting, the French government decided to withdraw the franc from the EC snake and allow it to float independently. When trading resumed on Monday, March 15, the franc at first plummeted over 5 percent in a nervous and uncertain market. But, as the cost of overnight borrowings in the Euro-franc market abroad soared to as much as 800 percent per annum, dealers responded by covering their extremely expensive short franc positions. The spot rate soon recovered to around \$0.2150 against the dollar, or about $2\frac{1}{2}$ percent below its old support limit against the German mark within the EC snake.

Over subsequent weeks, dealers remained cautious toward the French franc and there were no significant reversals of the speculative outflows of January-March. The franc market was roughly in balance, however, as a modest unwinding of adverse leads and lags and con-



versions of new French corporate borrowings abroad tended to offset continuing commercial demand for foreign currencies by French residents. The spot rate drifted down gradually to \$0.2108 by early June, as the dollar gained generally in response to a renewed rise in United States short-term interest rates. Against other EC currencies, the French franc held fairly steady. The Bank of France was therefore able to take advantage of occasional bidding for francs to purchase currencies in the market. Even so, the decline in France's reserves for the first five months of the year came to about \$3 billion.

During the summer, the market became even more hesitant toward the franc. Although the pace of inflation had moderated, many market participants feared that a continued expansion of domestic demand would reverse this trend and widen the gap between inflation rates in France and those abroad. Then, the market's attention shifted to the impact on France of the severe European drought. More serious in France than in most other countries, the drought was expected by many forecasters to push up food prices, cut into agricultural exports, and increase oil imports to compensate for the loss of hydroelectric power.

Under these circumstances, the selling of French francs again built up early in July. The Bank of France initially resisted with heavy dollar sales. But the pressures continued, fueled by open debate in the press over the government's resolve to stem a further decline in the rate and to contain continuing wage and price pressures. The authorities then moved to resist a further decline in the

franc rate by raising domestic interest rates, including a 1½ percentage point increase to 9½ percent in the Bank of France's discount rate, effective July 22. The market at first interpreted this move as indicating a considerably more flexible intervention policy, and the rate briefly eased further. By the end of July the spot rate had fallen to about 10 percent below its former lower intervention point against the German mark. Trading at \$0.2035, the franc was some 9 percent below early-February levels against the dollar.

ITALIAN LIRA

Pressure against the Italian lira had been building up during the fall of 1975 in response to deepening economic and political uncertainties in Italy. Industrial activity showed only tentative signs of recovery, as sectoral bottlenecks blunted the impact of the fiscal and monetary stimulus provided earlier in the year. At the same time, the strengthening of the dollar against the lira prompted large repayments of foreign borrowings by Italian banks and a drop in domestic interest rates facilitated the financing of a sharp rise in raw materials imports as firms began to restock depleted inventories. Thus, the outflow of capital accelerated and the trade balance deteriorated sufficiently to erode much of the improvement evident earlier in 1975. Meanwhile, the fall in real income in Italy and renewed upturn of the inflation rate had generated increasing political and social unrest, with important labor negotiations approaching a critical stage. After a prolonged cabinet crisis, Italy's minority coalition government resigned in January 1976 and, as efforts went forward to strike a new political compromise on which a viable cabinet could be formed, the lira came heavily on offer in the exchanges.

At first, the Bank of Italy countered these pressures with forceful intervention to keep the lira rate roughly in line with other European currencies. From January 2 to January 20, it sold more than \$500 million, raising the entire reserve loss since mid-1975 to \$2.4 billion. As a result, the Bank of Italy was left with only \$594 million in convertible currency reserves and, to add to its cash balances, it drew \$250 million under the swap line with the Federal Reserve. But, in the absence of a new government and with the adequacy of Italy's reserves a matter of open discussion in the press and the market, prospects of a further flight of capital from the country became overwhelming. Thus, on January 21 the Italian authorities announced that the Bank of Italy would suspend official dealings in the exchange market to conserve reserves.

This decision left the lira effectively floating freely

and, with selling continuing into February, the spot rate dropped fairly sharply from time to time in a thin market. There were occasional pauses in the decline, as traders responded to events which gave rise to hopes of an end to Italy's governmental crisis or a resumption of official dealing. Nevertheless, the market was so thoroughly demoralized that two hikes in the Bank of Italy's discount rate from 6 percent to 8 percent during February and increased bank reserve requirements evoked little market response. Moreover, the eventual announcement that a new minority government would be formed under Premier Aldo Moro gave but a momentary boost to market psychology. Instead, in increasingly one-sided trading, the lira fell to \$0.001245 (Lit 803) by February 24, 15¼ percent below levels prevailing before the cabinet resignation.

Meanwhile, the Italian authorities grew more concerned about the deterioration of market conditions and the drop in the rate that threatened to set off a new bout of inflation at home. Consequently, the Bank of Italy moved ahead with plans to resume official intervention to restore more orderly trading once again. Even as the new government was being formed, the Italian authorities initiated discussions for a new IMF standby and concluded arrangements with other EC governments to borrow \$1 billion in the international markets through the EC oil facility. As these negotiations to secure medium-term credit went forward, the Federal Reserve agreed to make available to the Bank of Italy, in addition to the \$250 million already drawn, a further \$500 million under the swap arrangement to backstop the Bank of Italy's cash resources.

Late in February, when the new government presented its economic program to parliament, the authorities also announced that they would reopen official exchange market dealings on March 1, with some \$2 billion of credit available including the funds extended for this purpose by the Federal Reserve. The market responded favorably and, while potential purchasers of foreign currencies held off satisfying their needs until March 1, the lira was marked up over 4½ percent to \$0.001302 (Lit 768) temporarily at the end of February.

In early March, when the backlog of commercial orders for dollars particularly by Italian oil companies reached the market, the lira immediately came under selling pressure. Then, just as the market was settling down, the lira was caught up in the resurgence of generalized speculation over European currency relationships. Hit by renewed selling, the spot rate was driven down by 9 percent to \$0.001188 (Lit 842) by March 16, even as the Bank of Italy provided large-scale support. The Italian authorities responded to these pressures by

tightening regulations on capital outflows and by restricting the capacity of commercial banks to cover their customers' forward lira sales through requiring a 10 percent reduction in commercial bank "spot against forward" transactions by the month end. More importantly, they imposed severe fiscal and monetary deflationary measures, raising the Bank of Italy's discount rate an unprecedented 4 percentage points to 12 percent and proposing emergency tax and gasoline price increases estimated to absorb some \$1.8 billion equivalent. The announcement of these measures, at a time when there were still only tentative indications of a recovery in the domestic economy, impressed the market and touched off a sharp rebound in the spot rate. In the forward market, however, the discount on three-month lire more than doubled to over 17 percent per annum on March 31, as liquidity in Italy tightened and the new exchange control restrictions began to take effect. Meanwhile, the Bank of Italy took down another \$250 million on its swap line with the Federal Reserve, raising the total of actual drawings to \$500 million. The EC oil-facility borrowing was also completed, bringing a further \$1 billion into Italian reserves.

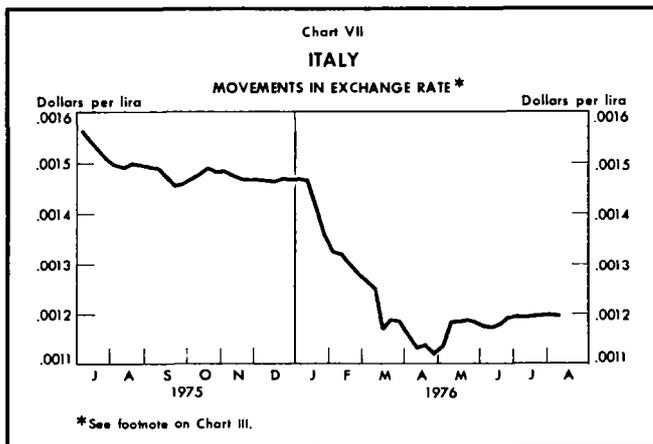
The tentative improvement in market conditions following the March measures was dealt a stunning blow in early April, when a serious disagreement over non-economic issues erupted in parliament. As it became clear that new elections were inevitable, market fears of a strong showing by the Communist Party led to renewed capital outflows which pushed the spot rate down by May 5 to a record low of \$0.001090 (Lit 917), fully 26 percent below early-January levels. Also in early May the forward

discount soared to 42 percent per annum.

After the close of trading that day, the Italian caretaker government began to announce a set of tough foreign exchange restrictions designed to curb import growth, to encourage reversals of adverse leads and lags, and to stabilize the lira spot rate until a new government could be elected. As of May 6, all foreign currency purchasers, except grain importers, were required to deposit 50 percent of the countervalue of their acquisitions in noninterest-bearing accounts for three months. This measure, aimed at discouraging speculative outflows via the over-invoicing of imports, was also expected to mop up about \$4 billion equivalent of liquidity over three months. On May 7, Italian exporters were told to convert foreign currency earnings within seven days of receipt to shorten the lag between export transactions and foreign currency conversions. On May 10, exporters granting foreign currency trade credits of up to 120 days were required to convert 30 percent of the value of those credits into lire within seven days of the transactions. Moreover, technical changes in existing exchange restrictions were announced to raise both the cost and risk of maintaining short lira positions.

The imposition of these sweeping exchange restraints provoked an immediate scramble for lira balances. The spot rate shot up to as high as \$0.001235 (Lit 810) in early European trading on May 10, before settling around \$0.001193 (Lit 838) later in May, 9½ percent above the low early in the month. Thereafter, as the exchange control measures continued to contribute to a squeeze on domestic liquidity, the lira traded more quietly around this level until the June 20-21 general elections.

The election outcome, with a narrow but clear-cut plurality for the Christian Democratic party, swept aside a major source of market uncertainty, and a reflux of speculative funds developed as soon as the first results were known on June 21. Thereafter, news of a reduced balance-of-payments deficit for May and a slowing in the rate of inflation lifted some of the gloom surrounding the Italian economic outlook. With Italy's tourist earnings becoming seasonally strong and the various exchange controls continuing to induce a reversal of adverse leads and lags, the lira came into demand. In view of the earlier heavy reserve losses, the Bank of Italy took advantage of the lira's buoyancy at prevailing rates to absorb large amounts of dollars in the market. Consequently, while the substantial inflows of funds continued, the lira rate held steady through end-July. The Bank of Italy was thus able to post reserve gains of \$1.7 billion for June and July, even after repaying in late July the full \$500 million of swap drawings on the Federal Reserve.



NETHERLANDS GUILDER

Coming into 1976, the Netherlands guilder was bolstered by expectations of a continuation of that country's strong payments position. A sharp rise in natural gas exports, together with a recession-induced fallback in imports, had already widened the current-account surplus to \$1.6 billion in 1975. With economic recovery well under way in several of the Netherlands' major foreign markets, the outlook for Dutch exports promised to be even brighter for 1976. Sizable capital outflows were expected to continue, reflecting the relatively low interest rates in Amsterdam compared with other financial centers, but not in sufficient volume to offset fully the current-account surplus. Moreover, although unemployment was still rising and the inflation rate was still about 10 percent, the domestic economy was beginning to show signs of an upturn. Consequently, exchange market sentiment was extremely favorable, and the guilder traded firmly at the top of the EC snake as well as at the upper limit against the Belgian franc in the 1½ percent Benelux band.

When tensions developed in many European currency markets in late January, a press report that the Benelux band might be abandoned—although immediately denied by the Netherlands and Belgian governments—triggered large-scale speculative demand for guilders and offerings of Belgian francs. To counter these pressures, the Netherlands Bank intervened in coordination with the National Bank of Belgium and bought substantial amounts of Belgian francs as well as dollars. The Dutch central bank announced a ½ percentage point cut in its discount rate to 4 percent and 1 percentage point reductions in other official lending rates. In Belgium, the authorities also took several measures to support the franc, including the boosting of short-term interest rates. This forceful response, coupled with an easing of liquidity conditions in Amsterdam and a corresponding tightening of liquidity in Brussels, reassured the market, and by early February the immediate strains had subsided somewhat.

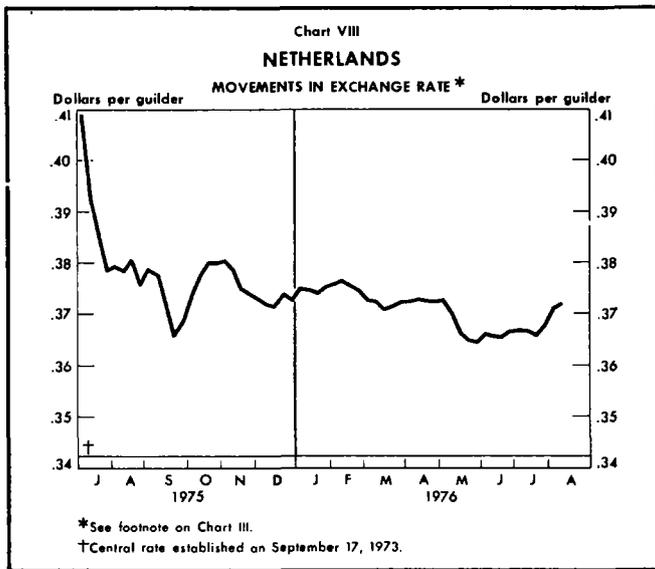
By that time, however, the markets were alive with rumors of a possible general realignment of EC currencies. In view of the strong ties between the Netherlands and German economies and the fact that each enjoyed a substantial current-account surplus, market participants tended to tag the guilder as a prime candidate for revaluation along with the German mark. Consequently, as the mark came into heavy demand, the guilder also strengthened, joining the mark at the upper limit of the EC snake and stretching the Benelux band once again. The dollar market became unsettled, too, and the guilder rose by ¾ percent to a peak of \$0.3781. In this atmo-

sphere, when a flurry of demand for guilders developed on February 11 in the New York market, the Federal Reserve supplemented its offers of German marks with offers of guilders, selling \$19.6 million equivalent financed by a drawing on the swap line with the Netherlands Bank. Subsequently, as the immediate exchange market turbulence abated and the guilder eased back somewhat, the Federal Reserve purchased sufficient guilders to liquidate the swap debt by early March.

Following sterling's drop below the \$2.00 level, expectations of a broader EC exchange rate realignment reappeared, generating renewed demand for guilders. By the second week of March, the guilder was hard against its upper margin for the Belgian franc. Even though there was sizable intervention to defend the Benelux limits, bringing total support since early February to over \$350 million equivalent, the guilder was pushed to the top of the EC band along with the mark.

The results of the March 13-14 EC finance ministers' meeting in Brussels had a jarring effect on market expectations for the guilder. The Benelux joint float arrangement was abruptly suspended, relieving an immediate source of speculative demand. At the same time, the press reported that, in the showdown which developed at Brussels, Dutch officials had rejected proposals to revalue the guilder. By that time, also, technical factors were weighing on the market, as the guilder liquidity created by central bank intervention, together with usual seasonal factors, had so eased money market conditions in the Netherlands that short-term interest rates there were well below those in Germany and Belgium. Consequently, the guilder came on offer, easing slightly against the dollar but falling sharply against the mark and other currencies within the EC snake. The Netherlands Bank began to sell moderate amounts of dollars to cushion the decline, but by April 6 the guilder had slipped to the bottom position of the joint float.

During the spring, several developments prompted increasingly bearish sentiment toward the guilder. Economic indicators during the first months of 1976 showed that Dutch exports had leveled off and that the incipient economic recovery at home had stalled. The inflation rate remained stubbornly high, well above those in Germany, Switzerland, and the United States. Moreover, serious union opposition had emerged to a proposed extension of the government's social contract for limiting wage increases. In addition, higher government borrowing requirements associated with continued growth of public sector spending were a source of concern to the market. At the same time, widespread press reports of disputes within the government coalition over a number of social and eco-



conomic issues added further to the uncertainties.

Through early May the spot guilder therefore stayed in the lower range of the EC band. Against the dollar it held steady at around \$0.3725, as the National Bank of Belgium completed guilder purchases to repay commitments incurred prior to suspension of the Benelux band. Thereafter, the guilder was left more exposed to selling pressure that intensified after mid-May. The rate began to soften and reached a low of \$0.3628 on June 1, some 4 percent below the February high, before the immediate selling pressure subsided. To keep the guilder away from its lower intervention limit against the mark in the EC band, the Netherlands Bank intervened in substantial volume, with the result that reserves declined by nearly \$1.2 billion between mid-March and mid-June. Moreover, the Netherlands Bank, following market developments, raised its discount rate in two $\frac{1}{2}$ percentage point steps to 5 percent by June 18. During that time, the Federal Reserve took the opportunity to purchase a modest amount of guilders (\$3.6 million equivalent) for working balances.

By mid-June the Dutch money market had gradually tightened, partly as a result of the heavy exchange market intervention by the authorities. Moreover, recent economic indicators were more favorable, with tentative signs of improvement in industrial production and better price figures. At the time of end-June positioning in the Netherlands, therefore, a scramble for guilder balances devel-

oped, pushing up market interest rates sharply and prompting some covering of short guilder positions in the exchange market. The guilder thus turned firmer against the dollar and came off the floor of the EC snake.

Thereafter, the guilder market was in better balance until late in July, when the snake came under renewed strains as the movement into German marks became more generalized. At that time, the Netherlands Bank again intervened in support of the guilder within the EC band and announced a further $\frac{1}{2}$ percentage point increase in its discount rate to $5\frac{1}{2}$ percent, effective August 2. By end-July the guilder rate had recovered to \$0.3708, some $2\frac{1}{4}$ percent above its June low.

BELGIAN FRANC

Late in 1975, Belgium's balance of payments had shifted into deficit as a result of a slowdown in exports and an increased outflow of long-term capital. Domestically, the economy was slow to join in the recoveries already getting under way in other countries. In addition, Belgium's inflation rate, while declining to below 10 percent, was still high enough to generate market concern that it could thwart a sustained recovery. There was further uneasiness that the government had not reached agreement with the trade unions for modifying Belgium's wage indexation system, a mechanism many observers felt was helping to weaken the competitiveness of Belgian exports.

Against this background, the commercial Belgian franc, trading around \$0.025520 *vis-à-vis* the dollar in early January 1976, had fallen to near the bottom of the EC snake and had also settled at the lower limit of the separate $1\frac{1}{2}$ percent Benelux band with the Dutch guilder. There was no particular pressure against the franc, however, until late in January when, amidst generalized speculation over European currency relationships, newspaper reports suggesting that the Benelux currency arrangement might be disbanded set off heavy selling of Belgian francs. The selling reflected adverse shifts in commercial leads and lags and was therefore concentrated in the market for commercial francs. The financial franc, which floats freely, moved in parallel to the commercial rate but was not under unusual strain. Although the press reports were officially denied, the pressure continued and intervention mounted by both the Belgian and Netherlands central banks, largely in Benelux currencies. As a result, liquidity tightened in Brussels and simultaneously eased in Amsterdam, raising the cost of holding positions short of francs and long of guilders and thereby relieving the strain on the franc by mid-February.

Bolstered by the continuing tautness in Belgium's local money market, the franc was not immediately caught up in the market turmoil surrounding other European currency markets early in March. But by March 11, as traders came once again to expect an adjustment of EC parity relationships, speculative selling of Belgian francs re-emerged. The spot rate was driven back to its lower limit against the guilder, where it again required heavy support.

The announcements following the EC finance ministers' meeting over the March 13-14 weekend only intensified the selling of Belgian francs. News that the French franc had been withdrawn from the EC snake and the Belgian and Netherlands governments had suspended the Benelux currency arrangement generated expectations that the Belgian franc would be either devalued or cut loose from the joint float. Dealers therefore drove the franc almost immediately to the bottom of the snake, which was then being pulled up against the dollar by the rise of the German mark.

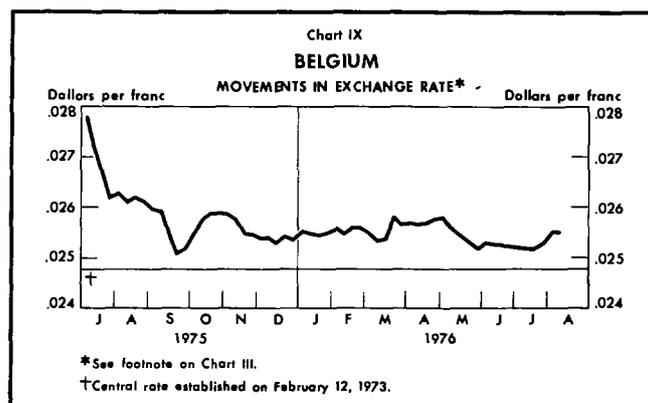
The Belgian government, however, quickly signaled its determination to keep the Belgian franc in the snake at its existing parity to prevent a falling exchange rate from aggravating domestic inflation. As the Belgian franc came heavily on offer against the mark at the lower limit of the snake, the National Bank of Belgium intervened heavily between March 15 and March 19, selling large amounts of marks while the Bundesbank purchased a large volume of Belgian francs in Frankfurt. Moreover, to convince the market of its resolve to support the franc, the Belgian authorities took further steps to raise the cost of holding speculative positions against the franc. The National Bank announced a 1 percentage point hike in its discount rate to 7 percent, effective March 18, and restricted access to its short-term lending facilities. In addition, it required commercial banks to deposit a fixed percentage of their funds in government securities. These measures were followed up with public affirmations on the part of a number of Belgian officials of their determination to guarantee the existing Belgian franc parity.

By March 22, the combined impact of these various liquidity-tightening measures had taken hold. Overnight rates in the Euro-Belgian franc market were bid as high as 200 percent per annum, and the cost of rolling over short franc positions became more than most speculators were willing to bear. Thus, in a sharp two-day turnaround, the franc jumped over 2 percent against the dollar and traversed the entire width of the EC snake before easing back to trade around \$0.025600, fairly comfortably within the joint float.

By early April, industrial production in Belgium was

rising more strongly than anticipated at the beginning of the year, but the pace of domestic price increases remained worrisomely high. The Belgian cabinet agreed on budget cuts on April 5 to reduce domestic inflation further and to provide support for the exchange rate. In addition, the authorities followed up their mid-March measures by strengthening the controls on resident foreign exchange transactions. The cumulative effect of these various actions was to trigger a gradual reversal of previously adverse leads and lags. As these reflows persisted throughout April and May, the Belgian authorities were able gradually to ease their mid-March monetary restrictions, reducing some interest rates to pre-crisis levels and, in early June, lifting the special regulations requiring commercial banks to maintain specific levels of investments in government securities. In addition, the National Bank completed its repayment of Dutch guilder commitments incurred prior to suspension of the Benelux band and purchased sufficient German marks to liquidate its commitments in that currency as well. Even so, the commercial franc continued to hold in the middle of the EC snake, while falling off with the other European currencies against the dollar.

Thereafter, dealing in francs was generally quiet and well balanced through early July. Only on two successive Fridays in late May-early June was trading temporarily unsettled by a spillover of pressure directed at the Dutch guilder. In each case, the National Bank of Belgium quickly countered with small sales of dollars. In mid-July, however, as the market began once again to reassess existing European currency relationships, pressures on the Belgian franc were renewed and the franc fell to its lower limit against the German mark. The National Bank re-



sumed its intervention and also announced a discount rate increase of 1 percentage point to 8 percent, effective July 26. Subsequently, the Belgian franc was dragged up by the rise of the German mark to trade by the month end at \$0.025527, close to its early-February level against the dollar.

During the six months under review, the Federal Reserve continued to make small frequent purchases of Belgian francs against swap commitments incurred prior to August 1971. These acquisitions, totaling \$177.3 million equivalent, were used to repay a total of \$170.5 million equivalent of such commitments, reducing the outstanding swap debt to \$82.4 million, and to add to balances.

JAPANESE YEN

Early in 1976 the balance of market sentiment had swung back in favor of the Japanese yen, as an unexpectedly rapid improvement in the balance of payments outweighed lingering concern over the sluggishness of Japan's economic recovery. The current account had returned to surplus, as export shipments of automobiles and a few other items expanded sharply in response to the inventory buildup in the United States and elsewhere while Japan's import growth remained stagnant. Moreover, Japan enjoyed sizable inflows of capital as short-term interest rates, though down from their mid-1975 highs, were still well above comparable interest rates in the United States. The resulting interest rate differentials favoring Japan stimulated large foreign purchases of Japanese government securities, not only on an uncovered basis but also on a covered basis, since the forward yen was frequently at a premium. Moreover, taking advantage of favorable market conditions, Japanese corporations were active in borrowing in the European and New York bond markets as well as through foreign-currency-denominated loans from Japanese branches of foreign banks. Conversions of these foreign borrowings gave an additional lift to the yen in the exchanges.

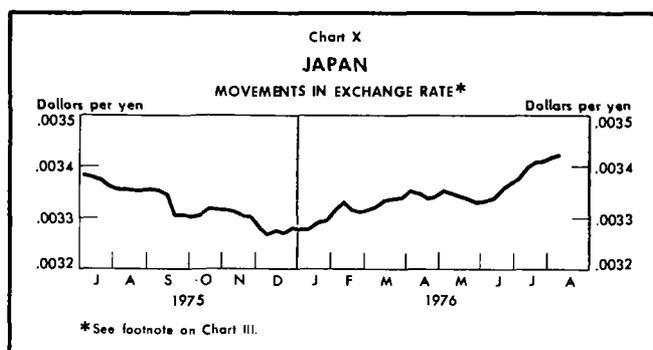
Coming into February 1976, therefore, the yen had advanced 1 percent from its December 1975 lows and it rose another 1 percent to \$0.003333 (¥300) by mid-month. In March the yen was again well bid, largely in response to uncertainties in the European currency markets. Meanwhile, a number of reports suggested that several overseas monetary authorities had increased their yen holdings. With these reports, market uncertainty over the durability of existing exchange relationships in general stimulated demand for yen by both residents and non-residents to cover future needs. By early April a scramble for yen developed, as Japanese banks and trading com-

panies rushed to cut back their dollar positions, Japanese corporations converted their foreign borrowings, and nonresidents responded to an increased premium on the forward yen by moving more funds into Japanese securities. The spot rate jumped in hectic trading to a peak on April 8 of \$0.003365 (¥297.2), some 3 percent above its mid-December low. Throughout this period the Bank of Japan met the sporadically heavy demand for yen with occasionally large purchases of dollars in Tokyo to moderate the rise and to maintain orderly markets. These purchases, especially in February and April, accounted for the bulk of Japan's \$2.1 billion increase in reserves in the first four months of this year, reversing the \$1.8 billion loss in the second half of 1975.

Although Japan's export performance in the first quarter had far outstripped even the most optimistic forecasts, by mid-April many market participants had begun to question whether this improvement could be sustained. The current sharp upsurge in exports was concentrated in only a few of Japan's export industries. A slowdown in consumer spending, together with increased talk of import restrictions in many of Japan's foreign markets, threatened to forestall any spilling-over of demand to other export sectors and to blunt sales of those exports currently in strongest demand. Moreover, figures for the first quarter pointed to a renewed strong advance in output in Japan and a decline in inventories of imported materials, suggesting that Japan's imports would soon expand as well.

This more skeptical outlook helped bring the market for the Japanese yen into better balance after mid-April. Shortly thereafter, interest rates in the United States began to firm while rates in Japan eased. As the previously favorable interest rate differentials narrowed and eroded incentives for foreigners to maintain their short-term investments in Japan, some of the earlier inflows were reversed. During subsequent weeks, the Bank of Japan intervened nominally, and then only to counter a brief flurry of demand for yen in early May. Otherwise, the rate eased back on its own, slipping 1 percent to around \$0.003330 (¥300.3) by June 4. Later that month the Japanese authorities took the opportunity to announce an easing of some foreign exchange controls—covering travel allowances and outward payments—that had previously been tightened in response to the oil crisis, but this announcement generated no immediate reaction in the market.

In late June, press reports out of the Puerto Rico economic summit suggested that officials of other countries had raised questions concerning Japanese foreign exchange policy. Subsequently, following release of further



strong trade figures for May, the Japanese press carried reports from a government source indicating a readiness to accept a further appreciation of the yen. In this atmosphere, the yen was bid upward once again, reaching as high as \$0.003420 (¥292.4) toward mid-July, before renewed intervention by the Bank of Japan and a prompt denial of the press reports quieted the market. Thereafter, in more subdued trading, the yen settled back somewhat to \$0.003412 (¥293.1) by the month end. At this level the yen was, on balance, about 3½ percent higher than early-February levels.

CANADIAN DOLLAR

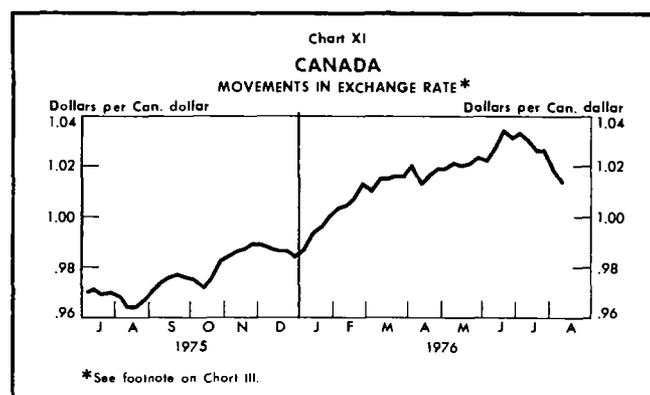
In 1974-75, with Canada's economic slowdown decidedly shallower than the recessions in other major industrial countries, domestic demand remained relatively buoyant, serious inflationary pressures persisted, and the current-account balance moved into deeper deficit. During the second half of 1975, this deficit was more than offset by an increasingly heavy volume of long-term foreign borrowings, which totaled \$3.2 billion. As economic activity in Canada gained more momentum from the pickup of activity in the United States, the Canadian authorities moved to check cost-push pressures by introducing a three-year anti-inflation program, which included wage and price controls, and announced targets to contain the growth in monetary aggregates. But the demand for credit remained strong, and Canadian interest rates did not follow the declines in other industrial countries late in the year. In response to the lower cost and greater availability of funds abroad, provincial authorities, public utilities, and private enterprises increasingly tapped foreign markets early in 1976, raising inflows to \$3 billion for the first quarter alone.

Thus, while the market remained hesitant about the

longer term implications of the more rapid wage inflation in Canada than in the United States, dealers expected that inflows of long-term capital would cover by far the current-account deficit and provide a strong underpinning for the exchange rate in 1976. Consequently, the Canadian dollar continued the steady advance that had begun in August 1975. Buoyed by conversions of several large new borrowings as well as occasionally heavy commercial demand for grain purchases, it was bid up to \$1.01½ by the end of February. The Bank of Canada, which continued to intervene to moderate day-to-day exchange rate movements, was on balance a buyer of dollars, and official reserves increased during the first two months by \$551 million.

From early March through late May, by contrast, the market for Canadian dollars was more nearly balanced. Day-to-day movements in the spot rate were at times quite large, as the market adjusted to the flow of continuing conversions, announcements of yet more new issues, or rumors of OPEC shifts into Canadian dollar-denominated assets. In addition, dealers were sensitive to signs of possible changes in interest rate differentials between Canada and the United States that might alter incentives to borrow abroad. In early March, in reaction to a slight firming in United States money market rates, the Canadian dollar eased before snapping back just a couple of days later after the Bank of Canada raised its discount rate from 9 percent to 9½ percent. But, on balance, by late May the Canadian dollar had gained only fractionally to the \$1.02 level, as part of the demand arising from continued conversions of foreign borrowings was increasingly taken out of dealers' own positions.

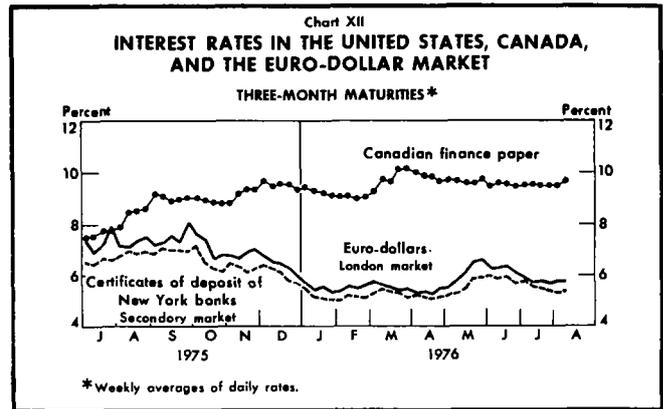
In early June, however, market sentiment became decidedly more bullish toward the Canadian dollar. The



domestic recovery seemed to be well under way and the rate of price advance had abated to 6 percent under the anti-inflation program. The Montreal Olympics was expected to generate substantial tourist earnings. The leveling-off of United States short-term interest rates was seen as a positive factor for the Canadian dollar. And then a renewed burst of reported foreign issues by Canadian interests caught many dealers by surprise. Consequently, market participants began to bid progressively more heavily for Canadian dollars, in part to cover the new large-scale conversions expected during the summer. By June 24 the spot Canadian dollar rate had been propelled to a two-year high of \$1.0388, with the Bank of Canada on balance buying substantial amounts of dollars to moderate the rise.

By this time, the rise of the Canadian dollar had attracted the attention of many more market participants abroad. Professional position taking increased, exchange rate movements for the Canadian dollar became more volatile, and each swing in the rate triggered a larger flurry of activity. In the face of these unsettled market conditions, the Bank of Canada operated increasingly forcibly on both sides of the market to maintain orderly trading conditions until market activity slackened by early July.

Subsequently, many market participants came to feel that the Canadian dollar had risen to unrealistically high levels. In addition, most of the conversions for the large borrowings placed in July had already been covered, and



the calendar of upcoming issues indicated a reduced volume of scheduled placements. Moreover, the eventual turnaround in tourist receipts, following the end of the Olympics, weighed on the market. Consequently, the Canadian dollar drifted back in a tendency that began to accelerate late in July as dealers started to cut back their own positions. By the month end, the spot rate had declined to \$1.02½, still some 3½ percent above early-1976 levels. Although the Bank of Canada was a net seller of dollars in July, its net market operations contributed to a \$467 million increase in Canadian official reserves since the beginning of the year.