

EXCHANGE RATE POLICY DEVELOPMENTS¹

A Brief Chronology of Exchange Rate Arrangements

On 4 March 1985, New Zealand adopted a floating exchange rate. Prior to this New Zealand had experienced a wide variety of different exchange rate arrangements. These arrangements are briefly examined here.

During the period prior to the establishment of the Reserve Bank of New Zealand in 1934, New Zealand's exchange rate was set against sterling (and therefore other currencies) by the Associated Banks of New Zealand (since superseded by the New Zealand Bankers' Association). This arrangement followed from the fact that New Zealand currency was the liability of Associated Bank members. Until 1914 the banks maintained the exchange rate as far as possible at £NZ100 = £Stg100. The outbreak of war in 1914 necessitated the suspension of some currency regulations. Consequently, there was no longer any compulsion for banks to continue to maintain the exchange rate so close to parity with sterling. Instead, the banks set the rate so as to preserve the level of their sterling reserves. As a result the New Zealand pound steadily depreciated against sterling during the remainder of the period in which banks determined the exchange rate.

With the establishment of the Reserve Bank in 1934, decisions about currency, credit control and the exchange rate were transferred from the Associated Banks to the Government. It was decided at this time to establish a fixed exchange rate in place of the adjustable exchange rate mechanism that the banks had been operating.

From 1934 until 1961, a formal link existed between the New Zealand pound and sterling. That link was

backed up by a commitment to use official external reserves to maintain convertibility at the specified level. That is not to say, of course, that the exchange rate remained absolutely fixed. With apparently increasing frequency, the rate of conversion was adjusted in response to the same factors that had earlier compelled bank managers to change the exchange rate.

For the first few years during which the formal link between New Zealand currency and sterling was maintained, New Zealand operated under a sterling exchange standard. The essential feature of this standard was the unrestricted convertibility of New Zealand's currency into sterling. This system was successfully maintained until 1938 when the demand for sterling increased to such an extent that exchange and import controls were introduced to prevent the exhaustion of New Zealand's sterling reserves. These controls were introduced so that the Government of the day could avoid having to tighten monetary policy to the extent that would have been necessary to maintain convertibility.

The exchange rate established by the Reserve Bank in 1934 remained unaltered until 1948 when the New Zealand pound was revalued by 25 per cent to restore parity with sterling. When sterling was devalued by 30.5 per cent against the United States dollar in the following year, New Zealand elected to maintain its parity with sterling and accordingly allowed its currency to depreciate against those of non-sterling currencies.

In 1961 New Zealand became a member of the International Monetary Fund. In accordance with one of the principal objectives of the Fund — the promotion of a stable international monetary system — each member was required to establish a par value for its currency expressed in terms of gold or the United States dollar. It was then incumbent on each member to confine selling and buying rates for spot exchange transactions involving its currency to within a margin of 1 per cent either side of parity. The par value proposed by New Zealand upon joining the Fund, expressed in terms of the United States dollar, was NZ£1 = US\$2.7809, which was equivalent to 2.47130 grammes of fine gold. This par value became the basis for quoting New Zealand's rate of exchange, since all Fund

¹ This article is based on an address by Mr M. Sherwin, the Chief Manager of the Reserve Bank's International Department to the Waikato Economics Society on 1 April 1985. A series of questions and answers about exchange rate systems is included as an appendix. More detailed information about exchange rate arrangements in New Zealand up until 1976 is available in the August 1976 issue of the *Bulletin*.

members were required to establish the value of their currency in the same terms. Despite this expression of the value of New Zealand's currency in terms of the US dollar (and through that, gold), it was the relationship with sterling and the Australian currency which determined changes in the exchange rate.

When sterling was devalued against the United States dollar in November 1967, New Zealand took the opportunity to move its currency to parity with the Australian dollar by devaluing by 19.45 per cent against the United States dollar. Subsequently New Zealand's exchange rate system was unaltered until 1971, when a restructuring of the world's monetary system occurred.

Following a series of currency crises and realignments during the late 1960s, a temporary regime known as the 'Smithsonian Agreement' was set up in December 1971 to facilitate the resumption of stable exchange rates. Under the 'Smithsonian Agreement', any member country was permitted to maintain margins for its currency of 2.25 per cent around the cross rate of the par values or central rates of that country's currency and its intervention currency (that currency which the member stands ready to buy and sell in order to perform its obligations regarding exchange stability). At that time, New Zealand followed the Australian example by electing to maintain its existing par value and nominating the United States dollar as its intervention currency. The par value for the New Zealand dollar was NZ\$1 = US\$1.1952.

Despite the realignment of currencies in December 1971, and the introduction of the Smithsonian system, exchange rate pressures persisted. As a result of these pressures sterling and 17 other currencies (excluding the US dollar) were allowed to float as from June 1972.

In February 1973 the United States dollar was devalued by 10 per cent, raising the official gold price from US\$38 to US\$42.222 per fine ounce. New Zealand maintained its existing parity relationship with gold, altering the par rate to the United States dollar to NZ\$1 = US\$1.3511. The US dollar was floated the following month with the suspension of gold convertibility.

With widespread floating of major currencies, the link with the United States dollar was causing the New Zealand dollar to depreciate against other currencies to an unwarranted degree. Considering the state of the economy, New Zealand terminated the link with the United States dollar in July 1973 and instead shifted to a system whereby the value of the New Zealand dollar was fixed against a basket of currencies.

After a series of discrete devaluations/revaluations, the 'crawling peg' approach to exchange rate determination was instituted in June 1979. Under this system, the New Zealand dollar was adjusted by small amounts, on occasions daily, with the main criterion for change being that of offsetting inflation rate differentials between New Zealand and its major trading partners. The crawling peg approach was ended in June 1982 when the wages and price freeze was imposed. Over the duration of its implementation the crawling peg system led to a depreciation of the New Zealand dollar against the basket of currencies by an average 0.5 per cent per month, i.e. about 6 per cent per annum.

From June 1982, the Reserve Bank reverted to fixing the exchange rate against a basket of currencies, with occasional discrete adjustments.

The Process of Fixing the Exchange Rate

Over the years, New Zealand has been forced to increase the sophistication of its exchange rate arrangements in order to keep pace with developments elsewhere in the world. Where for many years the Bank had stood ready to buy or sell pound sterling, United States dollars and Canadian dollars against New Zealand dollars, by 1979 it had become clear that this practice was no longer appropriate. As rates changed elsewhere in the world, the Bank became vulnerable to arbitrage against it. This problem was lessened in 1979 by simply discontinuing the practice of dealing in pound sterling and Canadian dollars. But this response in turn became inadequate.

The reality of an environment with all major currencies floating was that it was impossible to maintain an absolute fixed New Zealand dollar exchange rate against other currencies. Accordingly, from August 1983 the Bank tracked continuously throughout the day the changing value of the basket of currencies against each other, and the consequent changes of the New Zealand dollar against the United States dollar needed to retain the overall relationship of the New Zealand dollar against the basket of currencies.

The practice until 4 March 1985 was for the Bank to calculate a mid-rate against the United States dollar and then provide dealing rates on either side of the mid-rate. For example:

Reserve Bank buys US\$ -	0.4455 -----	
		dealers buy ----- 0.4452
Mid-rate -----	0.4450	dealers sell ----- 0.4449
Reserve Bank sells US\$ --	0.4445 -----	

The Bank's mid-rate (and therefore buy and sell rates) varied with developments in overseas markets. Between the Bank's buy and sell rates, dealers responded to market pressures — effectively 'floating' within a narrow band. The Bank however, was the residual buyer or seller of foreign exchange — effectively 'clearing' the market at the basket rate by providing foreign exchange or purchasing foreign exchange in whatever quantity was required to balance the private sector's supply and demand for foreign exchange.

As of 4 March the New Zealand dollar was floated and consequently the Bank's role in the market was fundamentally changed. Buy and sell rates are no longer quoted and the Bank no longer stands ready to balance supply and demand in the foreign exchange market. For each private sector seller of foreign exchange, there must be a buyer, and the price (the exchange rate) varies to reflect the relative weight of supply and demand pressures.

However, the Bank does still have a role in the foreign exchange market. Directly, as the Government's banker, it must satisfy the Government's needs for foreign exchange. Therefore, day-by-day, the Bank is active buying foreign exchange on behalf of the Government. These transactions are undertaken on a commercial basis, i.e. the objective is to obtain the most favourable rates available, within the general constraint of not unduly influencing the market in conducting that business.

Secondly, in order to remain in touch with the market, the Bank may engage in 'sampling' transactions. Thirdly, the Bank retains the right to

intervene by selling or buying foreign exchange to counter disorderly market conditions. It is envisaged that this right will be exercised infrequently.

Beyond this involvement in the foreign exchange market the Bank has a role under the remaining Exchange Control Regulations in the supervision of the market (mostly for prudential concerns) and the authorisation of foreign exchange dealers.

Why the Change to a Float?

An important reason for the change from a fixed to a floating exchange rate system was to facilitate structural adjustment in the New Zealand economy in response to changing external circumstances. When changes occur in key factors in the international environment facing New Zealand, such as a permanent shift in the terms of trade, structural adjustment is required in the New Zealand economy to preserve a balance of payments equilibrium. For example, if there is a permanent fall in the terms of trade, New Zealand may increase its exports and/or reduce its imports in order to maintain external equilibrium. Leaving aside the issue of private capital flows, and in the absence of Government measures (such as overseas borrowing) to maintain the level of domestic demand, total expenditure in New Zealand would fall in line with the nation's lower real income. This reduction in expenditure would directly reduce the demand for imports and would also tend to moderate the prices of non-traded goods and services in New Zealand relative to the prices of traded goods and services, the prices of which are determined internationally. The increased relative price of traded goods would provide an incentive for resources to transfer from non-traded to traded goods production. Together with the direct reduction in imports, this transfer of resources from non-traded to traded goods production should restore the current account to equilibrium.

This process of structural adjustment to a fall in the terms of trade is likely to be more costly in terms of lost output and employment with a fixed exchange rate than with a float. An essential feature of the adjustment is that the price of traded goods rises relative to the price of non-traded goods, thereby providing the incentive for resources to transfer to traded goods production. With a fixed exchange rate the price of traded goods is given at international levels and therefore the price of non-traded goods should conceptually fall to achieve this relative price change. Because domestic prices and wages are often inflexible downwards, it is likely that output and employment losses will occur before producers of non-traded goods respond to lower demand by adjusting their prices. With a floating exchange rate, the increase in the relative price of traded goods is instead achieved by a depreciation of the exchange rate. Producers of non-traded goods do not necessarily need to lower their nominal prices and accordingly output and employment losses associated with structural adjustment are likely to be smaller with a floating exchange rate.

So as to defer the costs associated with structural adjustment, Governments in New Zealand borrowed overseas to support domestic demand and thus inhibited structural adjustment in response to the nation's lower real income in the decade following 1974. The need for adjustment remained while \$14 billion of official debt was accumulated. While some of this debt accumulation was associated directly with investment projects, much

of it arose as a result of supporting domestic demand at a level higher than that compatible with external balance.

The experience of the past decade also indicates that when an administered exchange rate is eventually altered, the change tends to be later than would be preferable and may occur in large discrete and disruptive steps. Also, considerable difficulties are encountered in assessing what an appropriate change might be. Information about the adjustment required can never be complete, and because any adjustment is often in response to a substantial misalignment, the rate may be moved by too much in order to make sure that speculative flows are choked off or too little because of concerns about the inflationary consequences of the change.

In the period leading up to a discrete change in the exchange rate there are often strong speculative pressures. This speculation can provide private operators with large windfall gains at the expense of the taxpayer, since official overseas reserves are effectively used to provide the speculators' foreign exchange needs. Under a float, speculative profits can only be made at the expense of another private market operator — not the taxpayer.

The move to a floating exchange rate is also likely to assist in the conduct of monetary policy. The process of buying and selling foreign exchange to support the fixed exchange rate carries with it sales and purchases of New Zealand dollars by the Reserve Bank. These injections and withdrawals of New Zealand dollars can have an important impact on domestic liquidity conditions that may not coincide with the Government's monetary policy objectives. As was the case in the latter part of 1984, strong private capital inflows may frustrate the Government's wish to pursue a firm monetary policy. Alternatively, as in the first quarter of 1985, capital outflows can cause domestic liquidity to tighten quickly and possibly excessively. The result of these large foreign exchange inflows and outflows is interest rate instability and an inability to achieve the desired monetary policy objectives.

A floating exchange rate also provides the Government with an additional policy instrument over which to spread the pressures of economic adjustment to changed external circumstances or indeed its own domestic economic management. Under a float, the exchange rate adjusts so as to absorb some of these pressures which would otherwise be absorbed entirely in domestic interest rates, non-traded goods prices and external reserves. It is important to remember that most of the factors producing exchange rate movements are present and being felt somewhere even under a fixed rate regime.

Preparing to Float

The Reserve Bank had for some time been considering the possibility of a floating New Zealand dollar. The post-election briefing papers published in July last year gave a fair indication of where Treasury and Reserve Bank thinking on the matter rested at that time.

However, with the 20 per cent devaluation of the New Zealand dollar in July and the removal of interest rate controls, the Bank began to look with rather more intensity at the possibility of a float. This also involved an acceleration of a series of steps designed to ensure that should a decision to float be taken by the

Government, the institutional framework would be in place to cope with the new environment.

These steps began in late 1983 when under the previous Government additional foreign exchange dealers were licensed. That process was seen at the time as simply adding competitive pressure to the market in order to better serve traders. It had the further benefit, however, of adding to the 'depth' and liquidity of the local foreign exchange market.

To cope adequately with a float, it was clear that market participants must have:

- expertise;
- adequate dealing equipment; and
- a capacity to absorb and manage foreign exchange risk.

The first of these features is not readily created, but new dealers brought with them new expertise (often from abroad initially) and set in motion training programmes for local personnel. Also, New Zealand enjoys a particular position in international time zones — being the first financial centre to open as the North American markets wind down at the end of their trading day. New Zealand foreign exchange dealers had begun to carve out a small but important niche trading 'third' currencies, for example United States dollar against yen, deutschmark, pound sterling, Swiss franc, etc. In that way, many New Zealand dealers had gained considerable first hand experience of dealing with floating exchange rates well before the New Zealand dollar was floated. Moreover, a 'floating' forward market in foreign exchange had been operating for some time in New Zealand, giving dealers some feel for that sector of the market.

Other specific moves had been made over a period of time to strengthen the local foreign exchange market. Concerns about market 'depth' had led to a continued willingness to allow new participants into the market, and encouragement for foreign exchange brokers² to establish here. New Zealand now has three brokers operating, essentially 'lubricating' the New Zealand foreign exchange market and providing communication links to major markets. More importantly, the Government had indicated a willingness to allow 100 per cent foreign ownership of foreign exchange dealers to encourage larger capitalisation than had been common for those dealers starting here with a maximum of 70 per cent foreign ownership. The ownership and capital changes were intended to attract more participants of substance into the market and thus produce a better balance of market strengths.

The granting of increased foreign exchange exposure limits to foreign exchange dealers in October 1984 and the relaxation of exchange controls in December 1984 were also measures designed to achieve, among other objectives, a more suitable environment in which to float the New Zealand dollar. Increased foreign exchange dealer exposure limits enhance dealers'

² A foreign exchange broker provides information to New Zealand's licensed foreign exchange dealers and overseas banks about the most favourable buy and sell prices being offered for foreign exchange. Their involvement has the effect of reducing spreads between buy and sell quotes in the foreign exchange market.

capacity to absorb and manage foreign exchange risk. The free movement of capital between New Zealand and the rest of the world that is possible in the absence of exchange controls is an important factor in improving the market's ability to smooth day-to-day currency movements automatically, and thereby smooth exchange rate pressures.

In the 18 months or so prior to the float, the local foreign exchange market had undergone a dramatic transformation. Turnover in the New Zealand dollar spot market had increased by a factor of four to five times, with daily turnover pre-float running at NZ\$1 billion to \$1.5 billion. Furthermore, exchange rate buy/sell margins were very small, and the market was readily able to transact large parcels without difficulty.

Given all of these developments it was the Bank's view that sufficient policy and institutional changes had been established to provide the basis for a float.

Progress to Date

It is too soon to pass any particular judgement on the success or otherwise of the float. What can be said, however, is that developments in the first two months were satisfactory. In that period the exchange rate moved through about a 10 per cent range — both against the United States dollar and the basket index. While that is quite wide, the extreme prices which produced the outer edges of that range tended to be short lived. For the most part, trading occurred in a narrower band between US\$0.44 and US\$0.46.

Other indicators of the state of the market have also been broadly acceptable. Turnover has remained pleasingly high. The busiest day since the float saw \$1.2 billion turnover with the smallest daily turnover being around \$0.5 billion. Those figures are somewhat higher than had been anticipated. Spreads in the interbank market are typically quoted now at 15–20 basis points — although narrower spreads are available through brokers or in direct negotiation. Again that is broadly acceptable at this early stage. Similarly, the standard market parcel being dealt is improving. Parcels now tend to be \$2 or \$3 million, with some dealers happy to deal with \$5 million or even larger parcels on occasions.

Those are satisfying developments. However, it must be remembered that for the first few weeks, the foreign exchange market has been operating in a quite unusual environment. This was characterised by extreme interest rate pressures in the initial phases giving way to more normal interest rates, and a degree of uncertainty in the private sector about the future path of interest rates and liquidity. Only time and consistently firm policies can settle those uncertainties, but occasional flurries of activity and volatility must be expected in the foreign exchange market, and it would be unwise to expect that conditions will always be as stable as they have been over the initial weeks.

Also, it is clear that the forward market has yet to regain its full composure. Spreads there are large, and turnover low. That is a matter of some concern, but again it is one which will only be settled with time and with greater market confidence regarding the path of domestic liquidity/interest rates.