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The Impact of Money Service Businesses on Monetary Policy Objectives for the period 1989 - 1998

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We would like to acknowledge the time and assistance of officials of the Ministry of finance, the Central Bank, Commercial Banks and Money Transfer Agencies.

ABSTRACT

The capital liberalisation process adopted by Guyana since the late 1980's consistent with the IMF's Structural Adjustment Programme, included the abandonment of exchange controls and the retention of only soft limits on private capital receipts.

The mushrooming of "Cambios" in subsequent years was a direct result. Indeed, by 1998 these Cambios numbered around 30 as registered, of which, 20 (approx.) were non-banks. According to the Bank of Guyana Report, non-bank Cambios accounted for 30 percent of trade in Canadian dollars, 20 percent of trade in pound sterling and approximately 15 percent in United States dollars, in 1998.

Another interesting development over the period however, and one which seemed to be completely unanticipated by the authorities, was the growth of Money Transmitters (MTs). Some of these were extended operations of already existing Cambios while others were established specifically for the purpose of facilitating currency flows. Among the latter are internationally renowned service providers whose branch expansion into Guyana benefit from the removal of relevant restriction on foreign investment.

This study seeks to explore the implications of the operations of the Money Service Businesses (MSBs) on the effectiveness of the monetary policy measures of the Central Bank in influencing the intermediate targets of investment and exchange rate stability as well as the overall objectives of steady economic growth and domestic price stability.

The paper is divided into four (4) sections. In the first section we introduce readers to the types and characteristics of the MSBs in Guyana. A greater focus is placed on Money Transmitters precisely because of the limited existing information on these.

The second section attempts to show the relevance of these MSBs in terms of their relevant proportion of selective aggregates and conclusions are drawn therefrom.

In the following section three, a brief overview of the monetary policy identified by the Central Bank is given. This is then used to locate the specific features of the MSBs in order to highlight those areas of policy that could be adjusted. A single illustration of the level of adjustment is attempted.

Finally, in section four, the paper concludes with some recommendations for the integration of these MSBs into the country's financial system.

Overview

During the late 1980's the foreign exchange situation in Guyana had reached such proportions that a thriving black market for foreign currency emerged. Between 1987 and 1990 through the introduction of a Free Foreign Exchange Market Scheme, Commercial banks and the "parallel market" fell under a created Cambio system. All foreign exchange transactions except for a few major obligations such as fuel payments were permitted through these cambios.

According to Danns (1990), the main supply of foreign currency to the non-bank cambio derived from illegal activity such as smuggling, under-invoicing of imports, and drug-related activity. Personal remittances were also identified as a source as well as redirection of official trade earnings.

The Dealers in Foreign Currency (Licencing) Act of 1989 was the attempt to provide some order over this market without discarding the desired objectives of a free market scenario. As such dealers were allowed to be licensed to trade in foreign currencies once they satisfied some minimum discretionary requirements such as good character and financial standing.

The Act also gave the powers to license or de-license solely to the Minister of Finance who would also take the entire market for dealers into account in making his decision.

To date there has been no known case of ministerial revoking of any previously granted license. However, there is a strong belief that many of the existing cambios are unlicensed and that some of the earlier registered ones may have gone out or reduced their scale of business significantly.

The monitoring of these cambios has proved to be extremely difficult since the dealers are not mandated to sell their foreign currency to the established banks.

After about three (3) years of their legalisation, it was clear that their activities were getting out of hand as far as the information on volumes, origin and destination that financial management required. This even prompted a remarkable unannounced foray by the then Minister of Finance backed by sections of the Police Force, into the main downtown area where the major dealers were located.

It is not clear how successful was the intention of these "scare tactics" to regain some control over these cambio operations that had obviously been lost. Shortly after, however the Ministry of Finance relinquished the monitoring entirely to the Bank of Guyana's Inspectorate Division whilst retaining the approval to operate in the Minister himself.

The Central Bank requests submissions from the non-bank cambios of their opening and closing balances and rates for the week. There is however no system for checking the accuracy of these submissions as receipts usage is optional. A requirement to deal in limits of US$10,000 transactions to correspond with airport currency declaration, is also unenforceable since large amounts can be sub-divided and can go unnoticed.

The officials are not unaware of these shortcomings of the cambio operations as an interview with Bank of Guyana representatives (see questionnaire at Appendix I) indicated. However, their attitude of leaving well enough alone has served to encourage the smooth extension of this quasi-legitimate financial activity beyond mere sales and purchases of foreign currency, into guaranteed in and out transfers of foreign exchange by the cambio business as well as by specialised money transmitters who have entered the market.

Indeed the range of financial services now possible outside of the official banking system is quite substantial and includes not only money transmitters and cambios as outlined above, but also issuers of money orders and cheque cashers. In the literature these all fall under the rubric of Money Service Businesses or MSB's.

It is interesting to note that whereas the Dealers in Foreign Currency Act prohibited the cambios from engaging in credit or deposit-taking activity, no such constraint applies to Money Transmitters. A recent international announcement of a soon-to-be offered service of one of these better known operators has actually signaled a credit-card arrangement for qualified clients.

In these days of increasingly rapid adoption of the more sophisticated technology, a facility of this sort operating in the Guyana market is an early reality.

Two other interesting phenomena that diminish the relevance of the Act's constraints are also evident. One is the blurring of the distinction between 'balances retention' and 'deposits' especially in those cases where regular businesses maintain cambios for their own foreign currency needs.

The second situation that demands attention as to the breach or otherwise of the Act is the case where money transmitters do not repatriate the foreign currency received abroad, but either compete within the local foreign currency market (maybe at the commercial banks) for the quantity available at the point in time, or retain Guyana dollars balances for remittances in local dollars to the Guyana recipients.

Similarly for out-transfers it is hardly to be assumed that any conversions occur locally. Rather, the Guyana dollars received serve to provide the amounts for the next round of inflows in such a way that even if a commerical bank is involved, the amounts deposited are the netted-off residual funds to be withdrawn on the following day. The avoidance of maintenance of accounts at the Commercial Banks is one of the principal factors contributing to the attractiveness of these MSB's to their clients, some of whom are big businesses.

The number and volume of the transactions executed by the MSB's are therefore not traceable through the official banking system.

When we consider also that some of these flows represent receipts for locally provided services that for obvious reasons are undeclarable, we further appreciate the extent of distortion in the officially gathered data. From an interview with one of the larger money transmitters[1] it was learnt that a significant inflow of United States dollars into the country comes from "backtrack" operations. This is the local name given to the process for getting Guyanese who would not normally qualify for visas, to the United States using a mit of false and genuine travel documents and selected stopovers and pick-up points.

The fees for this service are then remitted to Guyana through couriers or transfers and converted to Guyana dollars at non-bank cambios.

These latter sums are not captured in the balance of payments, but the effect on the economy is real none-the-less. Many of the rapidly growing elaborate constructions found in villages are believed to have this kind of explanation.

But we also have the origin of some flows namely out-transfers, linked to services that are legal. The profits derived from merchandising especially, are more easily hidden and therefore more readily convertible to foreign currency outflows. These flows can be

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1. Name witheld by request. All interviews and instruments were introduced as of a purely academic research interest. As such no reference to illegal activity such as money laundering were made, however in recognition of the large potential that MSB's have for facilitating the 'layering' and 'integration' of proceeds from narcotics sales and other criminal activity, new Acts are being passed by the United States that would require more frequent and efficient reporting requirements.

relatively huge[2] and these cambio rates are preferred because they can remain unknown to officialdom and unchallenged by any enterprising inland revenue Office.

2. The manouvres to avoid duties on goods are facilitated by the wide frontiers of Guyana. Subsequent unfair competition in the market cf these goods allow greater sales volumes and high profits.

SECTION 2

SURVEY OF MONEY TRANSFER (MT) OPERATORS

Since no official data or information exist on the level and types of activity conducted by MTs, for the purpose of this paper a mini-survey was conducted in order to capture among other things the average volume of business, the size of the industry and the financial products offered. A questionnaire was prepared which sought to garner information in such matters as, (1) the length of time MTs are operating and whether they are of foreign or local origin; (2) whether they are involved in the cambio business as well; (3) average annual volume of inward and outward transmission for the period 1989-1998 (this period was sub-divided into two five (5) year periods i.e 1989-1993 and 1994-1998); (4) the most popular outward and inward transaction purpose by rank; (5) the most popular currency used; (6) the rate of commission; (6) whether there was a limit to the transaction size, and if yes what was it; (7) the kinds of benefits offered to customers; (8) the types of financial services offered to customers; and (9) whether they plan to offer additional financial services in the near future.

Based on information from the Central Bank and the telephone directory, it was found that the industry has some 13 officially known Money Transmitters. The possibility exists however, that there could be several others that are still operating in a clandestine manner as was indicated in section 1. A questionnaire was sent to each of these 13 operators. However, only seven or 54 percent of them responded. In this section of the paper therefore, an analysis and conclusions of the findings are presented.

Findings and Analysis

The information gathered show that Money transmitters were in the business for over 15 years. This activity began with two operators according to the data gathered, the Guyana Post Office Corporation being the first and longest of them. Another 57 percent or 4 respondents indicated that they were established for approximately 10 years, while the remaining one operator has recently come on the scene, less than 5 years.

Of the 7 respondents, 3 or 43% of them indicated that they are into the cambio business as well, which is defined by the Bank of Guyana as the buying and selling of foreign currency on the local market.

In order to determine the volume and significance of the money transfer business in Guyana the questionnaire provided several ranges such as:

US$1Mn - US$5Mn US$5Mn - US$10Mn US$10Mn - US$15Mn

US$15Mn - US$20Mn Over US$20Mn

in order to allow respondents to indicate their annual average volume of business for the period. The ranges indicated in table 1 were the ones most popularly chosen by the respondents.

The questionnaire also asked respondents to rank, based on their knowledge, who they felt were the five largest MTs in the industry. Their responses along with the average annual volumes of business indicated in table 1, allowed us to categorize MTs into large scale, medium scale and small scale operators for the industry as a whole (as seen in table 1). This information further helped to determine the nature of the 13 MTs in the industry, there are 1 large scale, 2 medium scale and 10 small scale operators.

Table 1: Average Annual Volume of Inwards and Outwards Transmission

1989 - 1993			1994 - 1998	
	Average Annual U$	Average Annual US$	Average Annual	Average Annual
Size	Inward	Outward	Inward US$	Outward US$
Large	5-10m	1 - 5m	15 - 20m	1 - 5m
Medium	5 - 10m	1 - 5m	5 - 10m	1 - 5m
Small	1 - 5m	1 - 5m	1 - 5m	1 - 5m

Table 2: An Estimation of the Average Annual Volume of Business of MTs by Industry Size and Entire Industry.

Size of Business	Inward Transmission			Outward Transmission		
	Lower End US$m	Mid Point US$m	Upper End US$m	Lower End US$m	Mid-Point US$m	Upper End US$m
Large Scale (1)	15.0	17.5	20.0	1.0	3.0	5.0
Medium Scale (2)	5.0	7.5	10.0	1.0	3.0	5.0
Small Scale (10)	1.0	3.0	5.0	1.0	3.0	5.0
Whole Industries	35.0	62.5	90.0	13.0	39.0	65.0

Since a set of ranges were used to garner the information on MTs level of business, it was decided that the lower and upper limits of each range indicated would be used to estimate the annual average volume of business, as well as a mean average of each range. The lower limit therefore represents the lowest level of business that was conducted by over the period for each size of operator, while the upper limit gives an idea of the highest level of business. The mean of each range indicates the average mean level of business each size of operator will conduct.

Using the lower and upper limits as well as a mean average for each range, an estimate of the average annual volume of business was calculated for each size of operator as well as for the entire industry in table 2. Therefore, table 2 shows that for the entire industry, the average annual volume of inward transmission at the lowest estimated level of business is US$35Mn while the highest estimated level of business annually is US$90Mn. The estimated mean level of business annually is US$62.5Mn. With regards to outward transmission, the annual estimates for the lowest, highest and mean level of business are US$13Mn, US$65Mn and US$39Mn respectively. It can also be observed form table 2 that the estimated annual inflows are substantially higher than the estimated annual outflows, hence, there is an estimated annual net inflow of foreign currency for the entire period. This outcome therefore reinforces our argument that, since the activity of MTs are not monitored by the Central Bank or any other Government agency, these large sums of net inflows are not accounted for in the official aggregates.

To show the importance of this sub-sector, the estimated annual average volumes for the whole industry, (in table 2) were calculated as a proportion of selected official aggregates such as GDP, Export Earnings, and Net official Private Inflows. This was done by calculating the lower, and upper limits as well as the mean annual average volumes as a percentage of these aggregates over the period. The annual average net volumes were also matched. Tables 3-8 indicate the outcomes of this exercise.

Table 3: Average Annual Volume of Business of MTs As A % of GDP (1989 - 1999)

Year	Inward Transmission							Outward Transmission					
	GDP (US$)	Lower Limit (US$m)	As A % of GDP	Mean Average (US$m)	As A % of GDP	Upper Limit (US$m)	As A % of GDP	Lower Limit (US$ m)	As A % of GDP	Mean Average (US$m)	As A % of GDP	Upper Limit (US$m)	As A of GPD
1989	380.3	35.0	9.2	62.5	16.4	90.0	23.7	13.0	3.4	39.0	10.2	65.0	17.1
1990	162.4	35.0	21.5	62.5	38.5	90.0	55.4	13.0	8.0	39.0	24.0	65.0	40.0
1991	318.6	35.0	11.0	62.5	19.6	90.0	28.2	13.0	4.1	39.0	12.2	65.0	20.4
1992	373.5	35.0	9.4	62.5	16.7	90.0	24.1	13.0	3.5	39.0	10.4	65.0	17.4
1993	466.2	35.0	7.5	62.5	13.4	90.0	19.3	13.0	2.8	39.0	8.4	65.0	13.9
1994	526.4	35.0	6.6	62.5	11.9	90.0	17.1	13.0	2.5	39.0	7.4	65.0	12.3
1995	632.2	35.0	5.5	62.5	9.9	90.0	14.2	13.0	2.1	39.0	6.2	65.0	10.3
1996	703.8	35.0	5.0	62.5	8.9	90.0	12.8	13.0	1.8	39.0	5.5	65.0	9.2
1997	745.7	35.0	4.7	62.5	8.4	90.0	12.1	13.0	1.7	39.0	5.2	65.0	8.7
1998	662.1	35.0	5.3	62.5	9.4	90.0	13.6	13.0	2.0	39.0	5.9	65.0	9.8

Tables 3 & 4 which measure the levels of annual average volumes of business as a proportion of GDP, show that at the lowest level of business the estimated annual inflow 9.2 percent of GDP in 1989, 21.5 percent in 1990 and 5.3 percent by 1998. At the highest level of business, the inward transmission as a proportion of GDP was 23.7 percent in 1989 moving to 55.4 percent in 1990 and to 13.6 percent by 1998.

Table 4: **Annual Average Net Volume of Business by MTs As A % of GPD 1989 - 1998**

Year	GDP (US$)	Lower Limit (US$m)	As A % of GDP	Mean Average (US$m)	As A % of GDP	Upper Limit (US$m)	As A % of
1989	386.3	22.0	5.8	23.5	6.2	25.0	6.6
1990	162.4	22.0	13.5	23.5	14.5	25.0	15.4
1991	318.6	22.0	6.9	23.5	7.4	25.0	7.8
1992	373.5	22.0	5.9	23.5	6.3	25.0	6.8
1993	466.2	22.0	4.7	23.5	5.0	25.0	5.4
1994	526.4	22.0	4.2	23.5	4.5	25.0	4.7
1995	632.2	22.0	3.5	23.5	3.7	25.0	4.0
1996	703.8	22.0	3.1	23.5	3.3	25.0	3.6
1997	745.7	22.0	3.0	23.5	3.2	25.0	3.3
1998	662.1	22.0	3.3	23.5	3.5	25.0	3.8

The mean average as a proportion of GDP, in 1989 was 16.4 percent and 38.5 percent in 1990 moving down to 9.4 percent in 1998. Outward transmission showed the same trend with much lesser proportions. At the lower limit in 1989 it was 3.4 percent of GDP and 8.0 percent in 1990, with a 2.0 percent in 1998. For the upper limit proportions of 17.1 percent in 1989 and 40.0 percent in 1990 then moving down to 9.8 percent in 1998 were derived. For the mean average of outward transmission the proportions were

10.2 percent, 24.0 percent and 5.9 percent for 1989, 1990 and 1998 respectively. In matching the net volume of inflows as a proportion of GDP the lower end of the scale show proportions of 5.8, 13.5 and 3.3 percent for 1989, 1990 and 1998 respectively. At the upper end the proportions were 6.6 percent, 15.4 percent and 3.8 percent while the mean average were 6.2 percent, 14.5 percent and 3.5 percent for 1989, 1990 and 1998 respectively.

The comparisons of these volumes against Export Earnings showed slightly higher proportion at all levels than those obtained when matched against GDP (see table 5 & 6). For instance, at the bottom of the range, the proportions of inward transmissions to export earnings were 17 percent in 1989 and 6.4 percent in 1998 while at the top of the scale, they were 44 percent in 1989 and 16.5 percent in 1998. The proportion of the mean average to export earnings were 30.5 percent in 1989 and 11.4 percent in 1998. In terms of the Net annual average, this showed percentages of 10-4 percent between 1989-1998 at the lower limit, and 12.2 -4.6

percent between 1989 and 1998 at the upper limit. The mean net volume as a proportion of export earnings were 11.5 percent in 1989 and 4.3 percent by 1998.

In contrast to the outcomes derived in tables 3, 4, 5 and 6 which compares the annual average volumes business by MTs against GDP and Export Earnings, table 7 and 8 show astronomically higher proportions when matched against official Net Private Inflows.

At the lowest level of business, the inward transmission as a proportion of NPI was 343.1 percent higher than NPI in 1989 while by 1998 this proportion fell to 76.1 percent. At the mean average level, the proportions were a high of 612.7 percent in 1989 and 136.0 percent in 1998. At the highest level of business the proportions were even greater, in 1989 it was 882.3 percent of NPI and 195.6 percent in 1998. In terms of the net inflow of currency that is derived annually by the industry when calculated as a proportion of NPI, it showed percentages of 215.7 percent in 1989 and 47.8 percent in 1998 at the lower limit. At the upper limit, the proportions were 245.1 and 54.3 percent for 1989 and 1998 respectively. The mean average turned out proportions of 230.4 and 51.1 percent for 1989 and 1998 respectively.

Table 5: Annual Average Volume of MTs Inward and Outward Transmissions As A % of Export Earnings 1989 - 1998

Year	Exports (US$ Million)	Inward Transmission						Outward Transmission					
		Lower Limit (US$m)	As A % of Exports	Mean Average (US$m)	As A % of Exports	Upper Limit (US$m)	As A % of Exports	Lower Limit (US$m)	As A % of Exports	Mean Average (US$m)	As A % of Exports	Upper Limit (US$m)	As A % of Exports
1989	204.7	35.0	17.1	62.5	30.5	90.0	44.0	13.0	6.4	39.0	19.0	65.0	31.7
1990	203.9	35.0	17.2	62.5	30.7	90.0	44.1	13.0	6.4	39.0	19.1	65.0	32.0
1991	239.0	35.0	14.6	62.5	26.2	90.0	37.7	13.0	5.4	39.0	16.3	65.0	27.2
1992	381.7	35.0	9.2	62.5	16.4	90.0	23.6	13.0	3.4	39.0	10.2	65.0	17.0
1993	414.6	35.0	8.5	62.5	15.1	90.0	21.7	13.0	3.1	39.0	9.4	65.0	15.7
1994	463.4	35.0	7.5	62.5	13.5	90.0	19.4	13.0	2.8	39.0	8.4	65.0	14.0
1995	495.7	35.0	7.1	62.5	12.6	90.0	18.2	13.0	2.6	39.0	7.9	65.0	13.1
1996	574.8	35.0	6.1	62.5	10.9	90.0	15.7	13.0	2.3	39.0	6.8	65.0	11.3
1997	593.4	35.0	5.9	62.5	10.5	90.0	15.2	13.0	2.2	39.0	6.6	65.0	11.0
1998	547.0	35.0	6.4	62.5	11.4	90.0	16.5	13.0	2.4	39.0	7.1	65.0	11.9

Table 6: **Annual Average Net Inflows of MTs As A of Export Earnings 1989-1998**

Year	Expert (US $ Million)	Lower Limit (US$m)	AS A % of Exports	Mean Average (US$m)	As A % of Exports	Upper Limit (US$m)	As A % of Exports
1989	204.7	22.0	10.7	23.5	11.5	25.0	12.2
1990	203.9	22.0	10.8	23.5	11.5	25.0	12.3
1991	239.0	22.0	9.2	23.5	9.8	25.0	10.5
1992	381.7	22.0	5.8	23.5	6.2	25.0	6.5
1993	414.0	22.0	5.3	23.5	5.7	25.0	6.0
1994	463.4	22.0	4.7	23.5	5.1	25.0	5.4
1995	495.7	22.0	4.4	23.5	4.7	25.0	5.0
1996	574.8	22.0	3.8	23.5	4.1	25.0	4.3
1997	593.4	22.0	3.7	23.5	4.0	25.0	4.2
1998	547.0	22.0	4.0	23.5	4.3	25.0	4.6

Table 7: **Average Annual Volume of Business By MTs As A % of Official Net Private Inflows (NPI) 1989 - 1998**

Year	Inward Transmission							Outward Transmission					
	Net Private Inflows US$m)	Lower Limit (US$m	As A % of NPI	Mean Average (US $m)	As A % of NPI	Upper Limit (US$m)	As a % of NPI	Lower Limit (US$m)	As A % NPI	Mean Average(US$m)	As a % of NPI	Upper Limit (US$m	As A % of NPI
1989	10.2	35.0	343.1	62.5	612.7	90.0	882.3	13.0	127.5	39.0	382.3	65.0	637.2
1990	16.4	35.0	213.4	62.5	381.1	90.0	548.8	13.0	79.3	39.0	237.8	65.0	396.3
1991	28.0	35.0	125.0	62.5	223.2	90.0	321.4	13.0	46.4	39.0	139.3	65.0	232.1
1992	137.9	35.0	25.4	62.5	45.3	90.0	65.3	13.0	9.4	39.0	28.3	65.0	47.1
1993	63.3	35.0	55.3	62.5	98.7	90.0	142.2	13.0	20.5	39.0	61.6	65.0	102.7
1994	46.8	35.0	74.8	62.5	133.5	90.0	192.3	13.0	27.8	39.0	83.3	65.0	139.0
1995	53.4	35.0	65.5	62.5	117.0	90.0	168.5	13.0	24.3	39.0	73.0	65.0	121.7
1996	59.0	35.0	59.3	62.5	106.0	90.0	115.5	13.0	22.0	39.0	66.1	65.0	110.2
1997	52.0	35.0	67.3	62.5	120.2	90.0	173.1	13.0	25.0	39.0	75.0	65.0	125.0
1998	46.0	35.0	76.1	62.5	136.0	90.0	195.6	13.0	28.3	39.0	84.8	65.0	141.3

Table 8: Average Annual Net Volume of Business by MTs As A % of Total Official Net Private Inflows (NPI) 1989-1998

Year	Private Inflow (US $m)	Lower Limit (US$m)	As A % of NPI	Mean Average (US$m)	As a % of NPI	Upper Limit (US$m)	As A % of NPI
1989	10.2	22.0	215.7	23.5	230.4	25.0	245.1
1990	16.4	22.0	134.1	23.5	143.3	25.0	152.4
1991	28.0	22.0	78.6	23.5	83.9	25.0	89.3
1992	137.9	22.0	16.0	23.5	17.0	25.0	18.1
1993	63.3	22.0	34.8	23.5	37.1	25.0	39.5
1994	46.8	22.0	47.0	23.5	50.2	25.0	53.4
1995	53.4	22.0	41.2	23.5	44.0	25.0	46.8
1996	59.0	22.0	37.3-	23.5	39.8	25.0	42.4
1997	52.0	22.0	42.3	23.5	45.2	25.0	48.1
1998	46.0	22.0	47.8	23.5	51.1	25.0	54.3

Further, to comparing MTs estimated annual average volume of business to GDP and the official NPI, we compared the official NPI to GDP in order to compare the level of significance of the official NPI and MTs activity to GDP. Table nine show that official NPI as a percentage of GDP for the period 1989 - 1998 peaked at 37 percent in 1992 but constantly declined to 7 percent by 1998.

Table 9: Net Private Inflows As a % of GDP 1989-1998

Year	GDP (US$M)	Net Private Inflows (US$M)	Net Private Inflows As a % of GDP
1989	380.3	10.2	2.7
1990	162.4	16.4	10.0
1991	318.6	28.0	8.8
1992	373.5	137.9	37.0
1993	466.2	63.3	13.6
1994	526.4	46.8	8.9
1995	632.2	53.4	8.4
1996	730.8	59.0	8.1
1997	745.7	52.0	7.0
1998	662.1	46.0	7.0

When the level of importance of official NPI and MTs eatimated net annual volume of business are compared to GDP, it is observed that at the lower limits of the inward transmission and acorss the range of the annual average net volumes of MTs activity show slightly lower proportions to GDP than official NPI to GDP. However, if we take the mean and the highest level of business for the whole MT sub-sector, the proportions to GDP are significantly higher than official NPI as a proportion of GDP.

In all of the above comparisons, the relative significance of the Money Transfer Businesses especially at the higher volume and leaves us to conclude that Money Transfer business is an important activity in the economy.

Concerning the currencies most popularly used in money transmission transactions, we asked respondents to rank these in terms of the first, second, third and so on, most popularly used currency. According to respondents, the United States currency, is the first most popularly used currency, with the Canadian dollars coming second and the pound sterling third.

The most popular destination of outward bound transaction show a similar ranking with the United States of America being the first most popular destination and Canada the second. The Caribbean in terms of outward transmission came third, with the United Kingdom falling fourth and Japan fifth.

In the case of Guyana, the most popular outward transaction purposes are firstly, business payments and lastly, education fees. In terms of inward bound transaction purposes, the most popular one is personal family support. Again, education fees was ranked as the second most popular purpose, with business payments falling into third place, pension payments fourth and guest workers/tourists ranking fifth.

These findings indicate that:

(1) a lot of business and individuals/families with relatives studying abroad use this service to settle their payments aborad;

(2) most of the payment transactions done outside of Guyana is with the United States of America;

(3) most of the support that families in Guyana receive from relatives aborad come from the United States of America.

In responding to whether there was a limit to the size of a transaction, only two or 29 percent indicated that they apply the legal soft limit of US$10,000.

Commission fees among operators range between 1 and 9 percent except in the case of 1 respondent who indicated that they had a sliding rate, but did not detail this.

All of the respondents boasts of benefits offered to customers such as speed, security, convenience, affordability, reliability, confidentially and delivery of currency to homes. However, 3 or 43 percent of the respondents indicated that, in addition to the usual money transfer, which include electronic money transfer as indicated by one respondent, they offer advances, cashing of foreign cheques and money orders.

Conclusions

Several conclusions can be drawn from the above analysis.

Firstly, because the activity does not fall under the perview of the Central Bank which is monitoring authority for the financial sector, it is not clear as to how many money transmitters are operating in Guyana. The data and information gathered represent those operating officially. In other words the estimated annual average volume of business for the entire industry as stated in table 2 could be higher.

Secondly, because of the confidential way in which these operator conduct their business in addition to the other benefits such as speed, reliability, and convenience, coupled with the financial products offered such as advances, and the cashing of foreign cheques and money orders, the industry has flourished and now compete strongly with the commercial banks and postal service.

It is obvious from the analysis above that MSBs provide a crucial service particularly to the business sector (and do not discriminate against small operatives) which has a genuine need for easy, convenient access to a reliable source of foreign currencies, a void that the commercial banks have failed to fill over the decade. Even though they are increasing in numbers, commercial banks are always short of foreign currencies.

Thirdly, the computations in tables 3 to 8 show that the money transfer business is relatively important in the financial sector and should not be overlooked. This sub-sector shows a similar level of importance to GDP as official net private inflows. When compared with NPI as a proportion of export earnings, the inward transmission at the mean and upper limit levels show slightly higher levels of importance than NPI while at the lower limit level and the net annual average volumes show slightly lower level of significance than NPI.

However, when MTs annual average volume of business are compared as a proportion of official NPI, the outcomes are astronomically high.

Table 10: **Official Net Private Inflows as a % of Exports 1989 - 1998**

YEAR	Export Earnings (US$M)	NPI (US$M)	NPI As a % of Export Earnings
1989	204.7	10.2	5.0
1990	203.9	16.4	8.0
1991	239.0	28.0	11.7
1992	381.7	137.0	39.0
1993	414.6	63.3	15.3
1994	463.4	46.8	10.1
1995	495.7	53.4	10.8
1996	574.8	59.0	10.3
1997	593.4	52.0	8.8
1998	547.0	46.0	8.4

Source: **Bank of Guyana Annual Report, 1998.**

While the selected aggregates are captured in the official statistics, the annual volume of business of MTs are not.

SECTION 3:

Effect of MSB's Operations on Monetary Policy Objectives

Monetary Policy Developments

The early half of this period under investigation can be characterised as a transitional period for the Central Bank as movements in the financial management tried to match the structural adjustment program along with the IMF.

The direct control measures of minimum liquid assets holdings and interest rate ceilings in the early 90's were necessary to drastically reduce the commercial banks liquidity.

As the fund-supported program for economic recovery intensified, the desire for more market determined action was increasingly adopted. With this policy reorientation were accompanying reforms in financial institutional infrastructure that included a new Financial Institutions Act. The Central Bank would improve its supervising and oversight role but gradually and steadily move away from the direct monetary instruments to the more indirect instruments consistent with the macro environment. Thus in the latter half we witnessed greater usage of reserve requirements and open market operations in Treasury Bills.

Liquidity management remained a priority[3] throughout, since it was recognised that monetary stability was the foundation of any economic recovery objective. A positive economic growth for Guyana had become an imperative. At the same time we could not have afforded an inflation explosion that was already threatening and could have been further aggravated by untamed growth.

Within the last two or three years the Bank of Guyana has adopted a Reserve Money Program framework[4] which essentially manipulates the Total Assets = Total liabilities identity of the Central Bank's balance sheet:

NFA + NDA = C + R + O where

NFA	=	Net foreign Assets
NDA	=	Net domestic assets
C	=	Currency in circulation
R	=	Reserves of commercial banks with Bank of Guyana
C + R	=	Reserve money
O	=	Net other liabilities or assets not otherwise accounted for.

This balance essentially gives an idea of the desirable levels of reserve money consistent with forecasted net asset flows. As the latter deviates from actual, new target for the reserve money are set.

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3. See Appendix 3 for spreadsheet detail of policies.

4. This is a fund-supported program and was selected as the first among other possible mechanisms to allow the infrastructural development for inter-bank, rediscounting and other secondary markets.
It also replaced a liquidity forecasting framework in use.

To achieve this desired reserve money level, emphasis is placed on influencing the commercial banks reserves through regular treasury bill auctions in pre-determined amounts.

Since price stability as a goal requires control over the money supply, the link between reserve money and money supply referred to as the money multiplier is then exploited. For purposes of this paper we will examine two instances of manipulation of this identity in the Central Bank's operationalising of the reserve money management program.

In each case we insert the behavior and characteristics of the Money Service Businesses to enable a conclusion on the quality of achievement to be anticipated.

Case 1: **<u>Influencing Liquidity through Reserves Levels</u>**

When the central bank places an amount of Treasury bills for sale, institutions in the private or public sector can remove their deposits from the commercial banks to purchase. With a fixed reserve requirement reduced deposits would imply reduced reserves. If the commercial banks themselves want to invest in the relative risk-free T-bills which is often the case, then the book transaction at the central bank would reflect the payment through a reduction of their reserves held at the bank of Guyana, which are often above the required reserves.

If members of the public had been able to compete successfully for the T-bills and purchased with currency holdings, this action would also have been consistent with the desired effect of reducing reserves.

The monetary intervention of the Central Bank as described above, provides the rest of the banking system and the public with a choice to respond to Central Bank's initiative in a demand/supply setting. It is clear however that there is some expectation of the clearing price (interest rate) in the decision on the amount of T-bills put up for auction as well as assumptions on the portfolio choices of the buyers. An offer of more T-bills, for example, that is greater than what the public wants to hold will tend towards lowering the interest rates.

These assumptions are indeed key to the speed and method with which the reserve and deposits movements filter through the economy to contract liquidity. However, these assumptions are premised on the data available this may not be reflective of the true situation because of less than complete reporting.

The transmission mechanism to the real sector also relies on text-book assumptions that may not be very relevant in the Guyanese situation. Private consumption may continue to expand in the presence of restrictive monetary policies.

In this particular instance where Central Bank operates on the commercial bank reserves component of the total reserve money as illustrated above, it is of interest to note that where money transactions occur rapidly within any one day, *liquidity conditions can* be changed to a much greater extent than the beginning and closing deposit balances would suggest. The essence of the Money Service Businesses, especially cambios, is precisely the rate at which they can turn over balances because this is where their profit lies. To a large extent cambios have to be always ready and on call at hours when banks are closed. Hence much cash is held outside of the bank and in homes.[5] There is also evidence that where dealers do have bank accounts, these could go into a pattern of daily substantial overdraft and next day settlement. This speed of settlement militates against record-keeping which may be considered redundant and costly.

The reserve money program has no way, as far as this author knows, of accounting for this very real phenomenon. Data obtained for just one of the main cambio transactions show an average annual turnover over the last three years of around US$26 Mn. This compares with the average annual trade by a major commercial bank of around US$60 Mn., that is a ratio of 1:2!

Although there are other factors not taken into account here, this sort of magnitude would warrant some attention. The deposit base that is assumed by the reserve money program is underestimated and the demand for currency is virtually unknown.

One suggestion may be that the sellers of foreign currency be allowed to hold foreign currency deposits as is done in some other Caribbean territories. These may, in turn, be subjected to reserve requirements and so able to affect credit demand and money supply in an accountable way.

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5. In a recent daring daylight robbery in Georgetown, it was reported that cash was taken from one dealer's car trunk!

It is time that accounts of cambio dealers exist but under their main business which may be merchandising. How much co-mingling of funds that occurs is unknown.

Case 2: <u>Influencing through Changes in Net Foreign Assets.</u>

From the balance sheet eq (2) it can be seen that an estimate of any three of the four variables can allow a projected value for the fourth. In practice these estimates are guided by the reading of the economy by the central bank and fund authorities, and are disaggregated at various levels for ease of determination.

Our discussion so far highlighted possible interventions that worked through commercial bank reserves with implicit assumptions that targets for the other variables of Net Foreign Assets and Net Domestic Assets, for example, were in place.

It is useful to examine the implications of movements in the item of Net Foreign Assets, where this is determined largely by the Balance of Payments.

Net Foreign Assets is the net of Gross International Reserves and Gross Foreign Liabilities. While the latter include mostly the government created debts and lines of credit, the international reserves arise from trade flows plus some degree of active Bank of Guyana investment and portfolio choices. Indeed the central bank has reported a release of part of its foreign currency holdings on more than one occasions in order to influence the exchange rate and/or absorb some of the local currency in circulation. A reverse operation is also conceivable.

As long as the Central bank has the capability of influencing liquidity through its foreign exchange actions, the extent to which it can do so must be influenced by the total foreign currency in the economy. It is here therefore that the net capital inflow that is facilitated by the money transmitters also becomes of significance.

There is no indication that the net transfers within the Balance of Payments incorporates these flows.[6] In this sense the capital inflow phenomenon in Guyana is inherently different from the flows associated with the Mexican and Latin American crises of recent years, in that firstly, to a large extent, these flows were intermediated through the commercial Banks. Secondly they represented international investors response to higher interest rates differentials.[7] As such there is no attempt here to deal with associated concerns of fixed versus floating exchange rate regimes or the benefit or not of capital controls.

However the potential impact on the real aggregates of consumption and investment of these unanticipated flows are similar.

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6. The main source of these flows are cited as Foreign embassies. The Survey on Money Transmitters signal much greater flows.

Because of the likelihood, as pointed out earlier, of foreign currency transfers fueling consumption beyond the output of the economy, the target for inflation could be difficult for the central bank to pin down. Further there is a greater risk of aggravating this situation when Bank of Guyana enters the market, unaware of sufficient information on either the supply or demand side.

A word on the movement appreciation of the Guyana dollar. Large foreign currency a inflows tend to support the local currency values at higher than the efficiency of production would suggest. It is possible therefore that the effect of recent declines in exports and other international receipts may have been cushioned by the presence of the remittances through the money transmitters. In other words, the Guyana dollar may be held at an artificially high level. Like in the case of the Asian crisis, if conditions no longer favour Guyana as a net capital destination, we can see a similar dramatic plunge in our currency.

A. ***Measure of the Influences***

As an indicator of the degree of success in the reserve money management program in the presence of these Money Service Businesses, two tests were applied to the main targets of the program, namely domestic prices stability and exchange rate stability.

A Domestic Price Stability

The periods chosen for domestic prices were 1997 and 1998 to represent a pre and post application of the program. Using a Chow Breakpoint test, the results did not enable a rejection of the hypothesis that there is no structural difference in the two periods. (See table 11)

In other words if we assume that the implementation of the reserve money management program was effected during 1998, we can find no reason to believe that it made an impact on the stability of the consumer price index vis-a-vis before its introduction.

This supports the contention of the study that as long as the existence of a major distortion in the market is not incorporated meaningfully into the policy making machinery, the likelihood of its success is small.

B. Exchange Rate Stability

The treatment of the stability question was slightly different in this case because the fluctuations are much more frequent.

Here a test of heteroscedasticity (White's) was utilised. The observations for this sample were taken from the Bank of Guyana's series on their transaction exchange rates.

Up until 1998, these were computed as an average of the Telegraphic Transfer Rates of the three (3) largest Commercial banks. The 1998 report however refers to "largest dealers" suggesting some explicit recognition of the non-bank cambios.

Because of this, the series was divided at the start of 1998. The test was applied to the first sample then to the second sample period.

The results here again did not allow a rejection of the null hypothesis that there was no difference in the variances between the selected periods. However a comparison of the F - Statistic would want to suggest a higher level of instability in the earlier pre-1998 years. (see tables 12 & 13)

This would correspond with the fact that the market including the non-bank cambios, had a greater stabilising force on the rate in the latter years, as well as represent the reality of Bank of Guyana's intervention in the market during 1998.

Although the latter action is not to be recommended since it will reduce the international reserves and could adversely affect needed imports, the result supports the strategy of encouraging market forces as opposed to controls. In this sense we see the Money Service Businesses especially cambios as being a welcome aid in the Bank of Guyana's attempts at exchange rate stabilisation.

Table 11: Structural Change in Consumer Price Index

Chow Breakpoint Test: 1998:01

F-statistic	0.030339	Probability	0.863316
Log likelihood ratio	0.033074	Probability	0.855690

LS // Dependent Variable is PRICES
Date: 10/16/99 Time: 00:31
Sample(adjusted): 1997:01 1998:12
Included observations: 24 after adjusting endpoints

Variable	Coefficient	Std. Error	t-Statistic	Prob.
PRICES(-1)	1.003591	0.001699	590.8216	0.0000

R-squared	0.910577	Mean dependent var	136.0458
Adjusted R-squared	0.910577	S.D. dependent var	3.773590
S.E. of regression	1.128445	Akaike info criterion	0.282454
Sum squared resid	29.28791	Schwarz criterion	0.331540
Log likelihood	-36.44398	Durbin-Watson stat	2.264656

LS // Dependent Variable is EXCHRATE
Date: 10/15/99 Time: 22:51
Sample(adjusted): 2 36
Included observations: 35 after adjusting endpoints

Variable	Coefficient	Std. Error	t-Statistic	Prob.
EXCHRATE(-1)	1.000705	0.000410	2438.355	0.0000

R-squared	0.899784	Mean dependent var	141.8143
Adjusted R-squared	0.899784	S.D. dependent var	1.086926
S.E. of regression	0.344087	Akaike info criterion	-2.105566
Sum squared resid	4.025459	Schwarz criterion	-2.061128
Log likelihood	-11.81544	Durbin-Watson stat	2.641312

White Heteroskedasticity Test:

F-statistic	1.408566	Probability	0.243768
Obs*R-squared	1.432778	Probability	0.231312

Test Equation:
LS // Dependent Variable is RESID^2
Date: 10/15/99 Time: 22:55
Sample: 2 36
Included observations: 35

Table 13:Exchange Rate Stability 1998

LS // Dependent Variable is EXCHRATE
Date: 10/15/99 Time: 23:01
Sample: 37 96
Included observations: 60

Variable	Coefficient	Std. Error	t-Statistic	Prob.
EXCHRATE(-1)	1.002374	0.000844	1187.563	0.0000

R-squared	0.973871	Mean dependent var	151.3500
Adjusted R-squared	0.973871	S.D. dependent var	6.111985
S.E. of regression	0.987962	Akaike info criterion	-0.007696
Sum squared resid	57.58805	Schwarz criterion	0.027210
Log likelihood	-83.90542	Durbin-Watson stat	2.021210

White Heteroskedasticity Test:

F-statistic	0.343497	Probability	0.710744
Obs*R-squared	0.714540	Probability	0.699584

Test Equation:
LS // Dependent Variable is RESID^2
Date: 10/15/99 Time: 23:02
Sample: 37 96
Included observations: 60

CONCLUSION

The message in the study is basically one of integration. The operation of the Money Service Businesses qualify them, if only by their volume of financial transactions to be incorporated into the financial system accounting.

The money transmitters on the one hand are essentially financial intermediaries. They effectively distribute funds, maybe less so from the savers to the borrowers and more so from donors to recipients. By facilitating remittances they are enabling an increase in the household income, thereby mitigating the downside of low wages.

The results of the survey done on this section of Money Service Businesses show that their net inflows are quite significant when matched against macroeconomic aggregates. Statistical tests on their influence on selected monetary policy targets also support their importance. In addition, like commercial banks they enjoy a high level of confidence from the public. The foreign exchange market provided by the non-bank cambios plays a crucial role in terms of speed and confidentiality for the private sector.

It is this aspect of confidentiality that has to be preserved in any move to incorporate the statistics of these businesses. Requirements under an Act for full disclosure will not in our opinion be effective. Attempts at one-off requests for information so vital for financial management will not capture the daily or weekly fluctuations.

It is widely recognised that the Money Service Businesses, especially with the non-bank cambios, is crying out for some regulatory or other monitoring attention. Systems for obtaining reliable information in the first instance must be urgently installed. From this information appropriate mechanisms for instituting a disciplined operation can be followed.

A preliminary recommendation of this paper therefore is that enabling legislation be created for these Money Service Businesses to be considered as financial institutions under an umbrella organisation. This organisation will have responsibilities, similar to a central bank with regard to supervision and oversight. Regular meetings between this Bank for Money Service Businesses and the Central Bank on a regular basis will help provide the information as well as help to determine overall policy in a more harmonized and efficient way.

APPENDICES

APPENDIX 1

SOME QUESTIONS FOR BANK OF GUYANA'S RE: PROPOSED MONETARY POLICY STUDY

1. Does the Central Bank have any registration process for non-bank money-transfer agents?

   [ ] Yes [ ] No

   If yes, which? a) Those advertised
   b) Mixed-service eg. Hotels,
   c) Other

2. Does the central Bank require all cambios to register?

   [ ] Yes [ ] No

3. Is there any monitoring of cambio operations by the inspectorate division?

   [ ] Yes [ ] No

4. Are there any regulations on the range of operations for cambios? Eg. Can a cambio also be a money transmitter?

   [ ] Yes [ ] No

5. Are there any regulations governing money transmission:

   (a) Banks (b) Non-banks

6. Is there any bank Secrecy Act which demands record-keeping and transaction reporting for:

   (a) Banks (b) Non-banks

7. Is there a foreign currency reporting for outbound transfers for:?

   (a) Banks (b) Non-banks

8. Is there any limit in amount beyond which reporting is required?

   [ ] Yes [ ] No

9. Is the Central Bank a signatory to any International Financial Regulatory Agreement?

[ ] Yes [ ] No

10. Is there a financial intelligence unit at Bank of Guyana?

[ ] Yes [ ] No

11. Are there any Central Bank controls on fees and commissions by:

(a) Banks (b) Non-banks

12. Are Financial Statements required from:

(a) Banks (b) Non-banks

13. What is the current perception by the Central Bank of Money Transmitters?

Strongly Disagree	Disagree	Undecided	Agree	Strongly Agree
1	2	3	4	5

(a) Useful public service to Guyanese.

(b) Providing healthy competition to banks.

(c) Requiring some level of Central monitoring.

(d) Potential risk to macro economic Stability.

APPENDIX 11

Questionnaire for Money Service Business

Name of Organisation:

...

Address of Organisation:

...

Position in Organisation of Respondent:

..

1. How long have you been in the money transfer business?

   [ ] 0 - 5 Yrs [ ] 6 - 10 Yrs

   [ ] 11 - 15 Yrs [ ] Over 15 Yrs

2. Are you also a cambio operator?

   [ ] Yes [ ] No

   If yes, how long are you in the cambio business?

   [ ] 0 - 5 Yrs [ ] 6 - 10 Yrs

   [ ] 11 - 15 Yrs [ ] Over 15 Yrs

3. What is your average Annual turnover in US$MN as a cambio dealer?

   [ ] US$ 5Mn - US$ 10 Mn [ ] US$ 10Mn - US$ 15 Mn

   [ ] US$ 15Mn - US$ 20 Mn [ ] Over US$ 20 Mn

4. As a money transmitter, what is the average annual volume of remittances inward?

- Between 1994 and 1998 [ ] US$1Mn - US$5Mn

  [ ] US$ 5Mn - US$ 10 Mn [ ] US$ 10Mn - US$ 15 Mn

  [ ] US$ 15Mn - US$ 20 Mn [ ] Over US$ 20 Mn

- Between 1989 - 1993 [ ] US$1Mn - 5Mn

  [ ] US$ 5Mn - US$ 10 Mn [ ] US$ 10Mn - US$ 15 Mn

  [ ] US$ 15Mn - US$ 20 Mn [ ] Over US$ 20 Mn

5. What is the average annual volume of money outflow as a money transmitter?

1994 - 1998 [ ] US$1Mn - US$5Mn [ ] US$Mn 5 - US$ Mn 10

[ ] US$ 10Mn - US$ 15 Mn [ ] US$ 15Mn - US$Mn 20

[ ] Over US$ 20 Mn

1989 - 1993 [ ] US$1Mn - US$5Mn [ ] US$Mn 5 - US$ Mn 10

[ ] US$ 10Mn - US$ 15 Mn [ ] US$ 15Mn - US$Mn 20

[ ] Over US$ 20 Mn

6. Please rank the currencies of origin of remittances most popularly used.

[ ] US$ [ ] Can $ [ ] Sterling [ ] TT $ [ ] Other (please state)

7. Please rank the most popular destinations for money out transfer.

[ ] United States [ ] Japan [ ] Canada

[ ] United Kingdom [ ] Caribbean [ ] Other (please state)

8. What would you say were the most popular outward transaction purposes. Please rank.

[ ] Business Payments [ ] Personal Family Support

[ ] Pension Payments [ ] Education Fees

[ ] Other (please state)

9. What would you say were the most popular inward transaction purposes. Please rank.

[ ] Business Payments [ ] Personal Family Support

[ ] Pension Payments [ ] Education Fees

[ ] Other (please state)

10. What are your average commission rates?

[ ] Less than 3% [ ] 3% - 5% [ ] 5% - 7%

[ ] 7% - 9% [ ] Over 9%

11. Is there any limit to the size of a transaction?

[ ] Yes [ ] No

If yes, what is the maximum amount in US$?

[ ] less than US$ 5,000. [ ] US$ 5,000 - US$ 10,000.

[ ] Over US$ 10,000.

If no, what is the average transaction amount?

[ ] less than US$ 5,000. [ ] US$ 5,000 - US$ 10,000.

[ ] Over US$ 10,000.

12. What are the main benefits offered by your organisation to the customer?

[ ] Speed [ ] Security [ ] Convenience

[ ] Affordability [ ] Other (please state)

13. What financial services do you now offer?

[ ] Advances [ ] Trade guarantees [ ] Cheque Cashing

[ ] Money Orders [ ] Other (please state)

14. Do you plan to offer any other financial service soon? If so, please state which.

....

15. Please share any other comment you would like to make.

....

....

....

PENDIX 3:

Monetary Policy 1989 - 1993

Year	Objective	Bank rate	Treasury bill rate	Prime Lending Rate	Fixed Deposit Rate	Savings Rate	Liquid Assets Holdings	Reserve Requirement
1989	In support of the pursuit of structural reform of the economy through the IDB/IBRD supported Economic Recovery Programme (ERP), monetary policy measures were designed within the framework of the ERP. In this regard, the government prusued a policy of domestic credit restraint coupled with the fostering of conditions for real positive rates of interest and the encouragement of financial savings	Increased to 35% from 14%	Increased to 33.7% from 11.3%	Rose to 36% from 15%	3-mos from 12% to 32.3% 6-mos from 12.5%to 33% 12-mos from 13% to 33.4%	Rose to 31.5% from 10.5%	Minimum holding of liquid assets levels were raised to 201.8%	
990	Domestic credit restraint continued	Reduced to 30% from 35%	Fell to 28.75% from 33.75% in 1989	Reduced to 31% from 36%	3-mos from 32.3% to 28% 6-mos from 33% to 28.5% 12-mos from 33.4% to 29%	Dropped to 27.4% compared to 31.5% at the end of 1989	Required minimum holdings of liquid assets by commercial banks remained the same as 1989 in 1990	
991	domestic credit contraction policy continued with the aim to reduce excess liquidity in the banking system	Increased to 32.5% up from previous rate of 30%	Compulsory conversion of 70-80% of commercial banks' excess lequidity into medium term variable interest rate debentures	Commercial banks continued to determine their rates freely although the Bank provided indicative rates from time to time	3-mos from 29.2% to 30 5% 6-mos unchanged 12-mos from 29.5% to 31.5%	Rose to 30.0% from 26.2%	The Bank applied a statutory liquid assets ratio which determines the minimum level of liquid assets holdings of commercial banks in relation to their deposit liabilities. These ratios are now 25% and 20% of demand and time liabilities respectively	
992	Credit policy focused on the reduction of credit to the public sector and freeing up of resources to the private sector	Rate changed seven times within the year to reach 24.25% at the end of the year	Treasury bills rate was linked with Bank rate	rate fell from 32.25% to 25.25% by end of year	3-mos from 29.2% to 18.2% not given not given	Rate fell to 16.58% by end of year		
[illegible]		Bank Rate which is now linked to the Treasury bill rate fell to 17% at the end of 1993	the primary sale of treasury bills continued to be the principal instrument for monetary management. Varying the volume and using market determined interest rates, worked to influenced commercial banks' reserves and interest rates. In this year, longer-term treasury bills (182 and 364 days) were introduced to sterilize the excess liquidity. Treassury bills interest rate were no longer administratively fixed but market determined. Treasury bill rate by the end of 1993 were 15.45% and 14.78% for 182 days and 364 days respectivley.	Not given	Interest rates fluctuated throughout the year and averaged 8.5% by the end of the year.		Liquid assets ratio remained at 25% for demand liabilities and 20% for time and savings liabilities	

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