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**FOREIGN DIRECT INVESTMENT AND THE RECENT
CAPITAL FLOWS TO BRAZIL:
ANY HOPES FOR CHANGE?**

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FOREIGN DIRECT INVESTMENT AND THE RECENT CAPITAL FLOWS
TO BRAZIL: ANY HOPES FOR CHANGE?

1. Motivation

There was a significant increase in capital inflows to Brazil in the nineties. Were investors only after a quick gain because of interest rates differentials far beyond perceptions of country risk or are there signals that they may contribute to an increase in the growth prospects? A convincing answer to this question depends both on a view on the elements behind these movements, acting on the supply and the demand-side of the recent flows and the effects the latter may have on growth constraints: on investment, on savings, and on the foreign exchange restrictions which are likely to bind Brazilian economic growth in the next years.

This paper examines some characteristics of the recent inflows against the background of past experience and focuses on the elements pertaining to policy uncertainty which has pervaded the Brazilian experience. Section 2 deals with aggregate description of the capital account and briefly assesses the fall in investment which occurred in the Brazilian economy, updating some information and analysis contained in Carneiro and Werneck (1993).

Since recovery in the investment ratio has been slow, we should not expect much from the aggregate impact of recent flows on investment. Before examining long run consequences, two warnings may be given: first, since Brazil has come late both in external debt rescheduling (Brady agreement was in 1994) and stabilization (first minimally successful attempt is only less than two-years old), there has been not much time for a noticeable structural change in the quality of flows. Much less for a significant change in real investment which may be attributed to the foreign capital

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inflows. Even so, a preliminary attempt is made at exploring the responsiveness of the quality of flows to a measure of risk premium derived from an investment decision model described in section 3.

In Section 4 there is a description of the sectoral data that is available and possible empirical explorations which may be attempted if some difficulties with the quality of capital stock data can be overcome. Section 5 raises policy issues which may be eventually explored.

2. Foreign Direct Investment to Brazil - Aggregate behavior

2.1 Historical perspective

From the 70s to the 80s there was a dramatic change in the domestic investment pattern. Data on current and constant prices gross fixed investment as a GDP ratio can be seen in table 2.3. Gross fixed investment in current prices shows a decrease from an average of 22% of GDP in the last five years of the 70s to 16.9% of GDP in 1984. From this year on, there was a surprisingly upward trend of the investment ratio to a high of 24.9% in 1989, in view of high uncertainty brought about by high inflation and unsuccessful stabilization attempts since the Cruzado plan.

When one looks to the constant prices ratio series, this upward trend is not observed. In current prices, the investment ratio hit its all time low in 1984, (15.7% of GDP). The conclusion is that in 1980 prices, however, the apparent recovery showed by current prices accounting hide a sharp relative price increase of capital goods and construction. Reasons are the high uncertainty concerning the legal value of contractual indexation following the Cruzado experiments, plus high relative price of imported capital goods, maybe because of less suppliers credit, plus lack of

official and multilateral financing, which traditionally supported long run investment projects.

If one considers the picture on the side of savings, it looks even worse. The reason is that public savings have not recovered from its slump in the eighties, in the absence of fiscal adjustment. Public savings averaged in the 70s 7.6% of GDP and fell during the 80s to -1.31% in 1989. In contrast to what happened in the 70s, when abundant foreign finance financed the rise of domestic investment, in the 80s the contribution of foreign investment was very small and negative at the end of the decade. As foreign savings fell during the 80s, investment was to be financed by the domestic private sector.

Resumption of high rates of growth cannot thus be warranted, in this context. Even after macropolicies became more sensible after 1991, presence and dominance of short run capital and the need of high interest rates to attract it should not come as a surprise.

Between 1987 and 1990, the Brazilian balance of payments current account showed a surplus (see table 2.2). Brazil had to adapt growth possibilities and invest less since investment was bound by (lower) savings minus foreign transfers as she did not qualify for new balance of payments finance. Because of the suspension of debt-related payments under an official moratorium declared in early 1987, financial as well as real resource transfers became negative. Virtually without any foreign exchange reserves, actually interest payments to private debtors were made throughout the period on the basis allowed by current account surplus. FDI explains the capital account surplus showed in 1988, thanks essentially to debt conversions of almost US\$ 3 billion. Actually, profit remittances show a record high level in the moratorium years.

From 1989 to 1991 net foreign investment (including reinvestment) averaged less than 500 million per year. Only after the real devaluation of 1991, the sharp increase in domestic interest rates and the recovery in international reserves, direct investment showed its first significant increase in almost ten years.

2.2 Macroeconomic context of the recent inflows

The behavior of net flows and components in 1990-95 are shown on tables 2.5 through 2.7. Share of FDI in capital inflows was high before the seventies, whereas loans became increasingly important in the 1975/82 years of high debt growth. After the external debt crash, debt conversion was expected to be the main source of FDI flows. Official debt conversion was relatively small in the eighties, but even so, it explains most of foreign direct investment, at least how come it did not become even smaller. Legislation and the failure to renegotiate external debt in early Brady both play a role. In 1990, the Collor pro-market stance did not help much because of the drastic intervention in financial markets. In spite of the privatization moves and the important trade liberalization reforms, only after Marcilio Moreira economic team worked hard to restore policy credibility foreign exchange reserves were restored.

Dominant features: consequences of low credibility following the failure of Collor experiments. Two tasks: overcome low confidence: devaluation and increase in interest rates. High reserves were necessary for recovery of governance and confidence in policy design after Collor interventions; high interest rates were necessary to allow the voluntary holding of public debt.

2.3 Supply

Since the late seventies, there has been a growing mobility of international capital. The share of Brazil decreased significantly in the eighties as protracted renegotiation of the external debt prevented participation of Brazil in the increase of flows to developing countries which happened in the second half of the eighties and the early nineties. By the end of the 1980s, Brazil received less than 0,6% of FDI in the world (14.6% of the flows to Latin America) compared with 6.2% in the end of the seventies (30.5% to Latin America).

Following a brief albeit serious reversion in the positive trend at the time of the international debt crisis, the first half of the nineties witnessed a substantial growth in capital flows across the borders, as dominant risks were perceived to be increasingly country-specific and no longer systemic. Three additional reasons may help to explain the higher volume of migrating capital: the decrease in costs of portfolio movements with the generalization of globalized trading, the ability of fund managers to persuade investors of their timely evaluation of expected gains and associated risks, and a trend to liberalize exchange markets almost everywhere.

As a result, a positive chain of reactions was made possible. Flows have become larger and more volatile, posing problems to monetary authorities in view of the disparities between the size of foreign exchange reserves in the vaults of Central Banks, as compared with the potential volume of capital that is available to cross foreign exchange markets. A good portion of the liberalization wave may in its turn be attributed to the recognition by local authorities of their limited powers to deal with massive runs on their foreign exchange reserves. More liberal exchange policies usually mean a greater reliance on market-determined exchange rates. Price movements of foreign

exchange in this context absorb a good deal of the energy, which otherwise has to be faced by direct interventions in self-fulfilling prophecies, that are common in foreign exchange markets. Smaller exchange controls make the country more attractive to foreign capital and thus hospitality breeds confidence and contributes to further enlargement of capital flows.

2.4 Domestic incentives

This section comments on the recent legislation, updating the comments of section 2 of Carneiro & Garcia 1995 (Carneiro, D.D and M.P. Garcia "Private Capital Flows to Brazil", ECLAC/UNDP, Serie Financiamiento del Desarrollo, N° 33, Santiago, Chile, October 1995.) Updated legislation is described in Annex 1.

The main objective of the Brazilian legislation regulating capital flows has historically been the repression of capital flight and tax avoidance. ... As domestic financial repression created obstacles to financial products to attract savers, the accumulation of wealth led naturally to an increased demand for foreign assets. Tax avoidance has understandably been at the center stage of the debate around the limits to liberalization of capital movements.

One thing is to speak of the legal restrictions to capital flows; quite another thing is to evaluate the effectiveness of such legal restrictions. Here expected costs and benefits of abiding by the law are an important determinant of the actual outcome. As an example, limits to capital movements are certainly easier to implement in countries that are more isolated geographically, like Brazil, than in countries with an intense movement of people and goods across the boundaries, as is the case in Europe, for example. After the financial liberalization of Uruguay, for example, capital controls became much more difficult to enforce in Brazil, and thus

the way was open to the process of liberalization which has been taking place since 1990 .

A second type of motivation for the legislation concerning foreign capital is of course nationalism. In the early 1960s, when the political strength of economic nationalism reached a peak in the post war years, foreign capital was seen by most influential political leaders at best as unwanted and a necessary evil a poor country would have to live with for a while. Concern with legal means to limit profit remittances of multinationals was the main motivation for the approval of Law 4131 of 1962, which remains so far as the central piece of legislation regulating the presence of foreign capital in Brazil. The law 4,131/62 was considerably softened by law 4,390/65, as well as by decree 557,662/65, which increased the limits to the remittances of dividends. As noted by Franco (1990), this institutional setting proved to be robust enough to remain untouched for over twenty-five years.

Such unusual institutional stability has been affected by the recent movements starting in 1990, in favor of a higher degree of financial openness after the peak of the external debt crisis had past and the all-time high uncertainty concerning the rule presiding financial contracts in the domestic economy had been achieved following the Collor stabilization plan in March 1990.

After 1991, the legislation concerning foreign investment tended to be more receptive. Currently, there are several channels through which foreign investors may invest part of their portfolios in Brazil. As of February 1996, most of the capital inflow to Brazil corresponds to portfolio investments and currency loans. Foreign investment in Brazilian markets are basically of two types: fixed income or portfolio investment (stocks and derivatives), as a natural consequence of the extremely high real interest rates (see table 2.6).

Foreigners may invest in fixed income securities and are taxed differently from investors in stocks through Fixed Income Funds, created in late 1993 and regulated by the resolution 2,034 of the Conselho Monetario Nacional and Central Bank's circular 2,388. These funds are constituted by either legal residents or with home-offices abroad. At least 35% must be held in public bonds and no more than 20% in private bonds. These funds did not attract a very significant amount because of the upfront taxation of 7% and the possibilities of avoiding it through financial engineering, as mentioned below.

Foreign investment is nowadays concentrated in portfolio investment. Foreign portfolios were created and are regulated by the Annex IV of resolution 1,289 of 199 . Only institutional investors are allowed to invest in those funds: financial institutions, insurance companies and foreign investment funds. Through these funds institutional investors can acquire Brazilian stocks and derivatives assets. Recently, (February 1996) foreigners were forbidden to buy privatization securities bonds directly through Annex IV, but such securities can still be purchased through privatization funds and pay from this year onwards a 5% tax.

After an initial period when the capital inflow was instrumental to the recovery of foreign reserves in 1991 and 1992, the Central Bank, in the second half of 1993, imposed restrictions on capital inflows. At first, only fixed income investments were taxed, and since August 1995 this tax rose from 5 to 7% and loans not related to trade pay 5% transaction tax upon entrance (stock-market investments are still not taxed). With so many derivative markets, however, it is very hard to keep foreign investors from profiting of the very high real interest rates, as some regulators would prefer. To avoid fixed income taxation, one of the most widely used operations to transform an investment in stocks in an investment in fixed income is the so-called box

operation in the options market, a joint trade of four options (two calls and two puts) that produces a return that is known in advance, just like a bond. By an arbitrage argument, this return must equal the interest rate. As of August 1995, foreign capital was banned from box operations, as Annex IV funds were prohibited from operating in futures markets.

Table 2.10 shows the monthly evolution of foreign investment in funds and portfolio since January 1994. The statistics show that most foreign resources go to portfolio investment (Annex IV). Those investment amounted to US\$ 17.88 billion or 83% of total foreign investment in November 1995. Fixed income funds is the second destination of foreign resources with a total amount of US\$ 3 billion or 14%. And Annex II and other funds (such as privatization funds) have only 2.77% of total foreign investment.

Monthly data show a considerable increase of foreign investment following the Real Plan. Total foreign capital rose from an average of US\$ 15 billion in the first six months of 1994 to an average of US\$ 24 billion in the second half of the year. Nevertheless, the Mexican devaluation crisis in December and the Brazilian speculative crisis in March has smoothed this trend. Following the devaluation in March, international reserves losses amounted to US\$ 4 billion. This loss had been recovered by August 1995, when reserves reached US\$ 45 billion, around US\$ 14 billion above April figures, and surpassed by US\$ 5 billion its record high of September 1994.

Following the difficulties mentioned above, average capital stock amounted US\$ 19 billion in the first six months of 1995, but they are still above last year's figures for the same period. Part of this reduction may be explained by the fall in stock prices, since stocks are around 77% of the Annex IV. Anyway, foreign investment has been increasing since May and from July to November, total capital stock averaged US\$ 22 billion.

2.5 Volatility and the response to short-run incentives

During and following the Mexican recent turmoil, Brazilian authorities have not shied away from adopting frequent changes in the legislation, especially those items concerning the taxation and other incentives to short term capital. To what extent have aggregate flows responded to short run incentives, and change of rules? Can we relate volatility to the implicit measures of risk computed in section 3 below?

As of January 1995, the last available data show net portfolio investment inflows of US\$ 715 million (US\$ 1,956 million inflow compared to US\$ 1,240 million outflow). Since 1991, following the adoption of new rules more hospitable to foreign portfolio investment, a total net inflow of US\$ 12.176 billion occurred, estimated to be worth 20.871 billion as of January. Of this amount, 90.84% went to the stock market and 4.72% in bonds (convertible debentures) and an estimated 3.75% are in so-called privatization monies, that is, government debt which may be used in privatization auctions.

Who administers such funds? (Citibank US\$ 3.798 billion, Boston US\$ 2.900 billion). A total of 518 portfolios are registered, 45% are administered by Brazilian banking firms, non banks intermediaries such as brokers and special purpose funds are responsible for a share of 21% while pension funds only 1% of the total. See table 2.8 for data on bond issues in 1994 and 1995 and table 2.9 for lead managers in the same period.

WHERE DOES IT COME FROM? Central America fiscal havens (24% of the 518 registered portfolios of Annex IV, 33% North America and 21% Europe. For FDI origin see table 4.5.

3. Timing and the composition of capital inflows

Resumption of growth prospects are essential to expectations of profitability of new projects. High inflation meant a permanent instability concerning basic rules and exchange rate prospects beyond indexation rules (examples: in spite of daily exchange rate indexation, real exchange rate was usually overvalued following inflationary upsurges). Timing and the propensity of foreign investors to wait and see, seems to be essential, in the case of Brazilian recent experience - share of FDI in capital flows after 1991 tend to corroborate this opinion.

Brazil was very slow to promote stabilization compared with Chile, Argentina and Mexico. Therefore other reforms were delayed. A good example was the protraction of privatization following the failure of the Collor stabilization attempt in 1990. But it was widely believed that, as soon as the hyper-inflation menace was left behind, and the state reformed, (Carneiro-Werneck, 1995; Werneck, 1995) a new phase of economic growth was to be expected. Basic reasoning was that the high uncertainty brought about by the macroeconomic instability and hyperinflation menace posed a high risk premium on the decision to invest, especially in long maturities projects.

3.1 Uncertainty and the cost of waiting

Recent approaches to the theory of investment (Pindyck, 1994) emphasize the role of the cost of waiting for a better opportunity as a determinant of investment outlays which may help to throw some light into the determinants of FDI-related inflows, compared to other form of capital movements. The basic idea is to make use of the option pricing approach: if the potential investor postpones his time of entry he pays for it, but he still retains the option to enter later, when a less uncertain evaluation of the prospects for reform can be made.

In this section we make use of a simple model which has been previously used by Dornbusch (1990) to explain the risk premium for the Mexican economy following the stabilization reforms. The basic idea is to make a few simplifying assumptions to model: the relationship between an investor's beliefs concerning the future evolution of the rates of return in a risky economy and the premium he demands to go ahead and invest instead of waiting and acquiring more information.

The beliefs of an investor may be taken as the probability distribution describing the possible future events of the economy. Since this is usually an unobservable characteristic of the investor, it is useful to make use of simplifying assumptions to allow an explicit calculation of the relation between these beliefs and the risk premium.

The first assumption limits the range of possibilities for the evolution of the rates of return during the maturity of the investment. In the present case, it suffices to assume that there are two alternative states of the nature: one where policy reforms are assumed successful and the expected rate of return is high -the good state- and the bad state. At the moment of decision, reforms are but a promise and those who are brave enough to enter the country at early stages do so because they believe that they will reap good profits soon since the good state is around the corner.

Since there are only two possible states of nature at the recipient country, in the good state the return on an investment will be labeled r_g , and r_b in the bad state. In order to determine the possible paths to be followed by the rates of return, it is assumed that the investor's evaluation of states follows a Markov process: this means that the probability distribution for all future values of the process depends only on its current value, and is unaffected by past values of the process or by any other current information. In a bad state there is a probability q of persistence

and a probability $(1-q)$ of a shift to a favorable state. Thus, q can be interpreted as the probability of bad news and $(1-q)$ as the probability of that reforms will be approved and change the prospects of the economy. A further simplification made is that, once a favorable state prevails, it is expected to last forever.

A more difficult assumption that is needed in the present interpretation is that this process repeats itself at each point of decision. The investor can either wait and apply his wealth abroad affording to a known rate of return r , or realize a direct (irreversible) investment in this risky environment with two states of the world, where rates of return follow the pre-specified paths. Each investor is understood to have his own belief towards the future evolution of the rates of return, differences between economic agents reflecting their private sources of information and particular ideas about the environment, and their decisions are made separately. Finally, that investors are assumed to be risk-neutral, so that they differ only with respect to their assessment of the most convenient time of entry, since those who stay out keep their option to enter.

The relationship between premium and belief is obtained through the definition of this premium. As we begin at the bad state of the economy, we can show what would be the required premium for an investor to go ahead and invest, instead of taking a "wait and see" position, maintaining the option of entering once the favorable state is verified. The difference in return obtained between the value of these two possibilities defines the required premium, given by:

$$^U = [q / (1+r-q)] (r-r_b)$$

This result confirms the so-called Bernanke's Bad News Principle that the option value of waiting depends only on the bad news, not the good news. The reason is that investors can always

benefit from the good state situation if they wait for it to invest.

We can observe in the equation above that the size of the required premium for an immediate commitment grows with the probability of persistence.

3.2 Protracted stabilization and covered interest parity

Table 3.1 shows a first estimate of the covered interest parity using T-bills interest rate, a riskless overnight monthly interest rate applied to Federal bonds backed assets and the expected rate of exchange devaluation measured in the first date of each month in the BM&F exchange futures market. The covered interest parity calculated as $\{(1+RN)/[(1+E)(1+TB)] - 1\}$, where RN is the domestic interest rate, E the expected devaluation in futures market and TB the external interest rate, may be seen as a pure risk premium which depends on the probability of the different states of the economy.

Assembling the data on the risk premium and the defining r_g , r_b and r , the specified model may be used to determine the implicit belief concerning the future evolution of the rates of return. This belief reflects essentially an aggregate behavior, outcome of independent decisions. We need to choose the certain rate of return to be used, and the low rate of return of the pre-reform economy, r_b .

In a preliminary exercise, the certain rate of return chosen was the US T-bills interest rate and the low rate of return was taken to be zero.

The last column of table 3.1 shows the results of this computation.

3.3 Quality of the capital flows

One may then seek an explanation for the timing of FDI inflows in the implicit probabilities of bad scenarios as suggested by the evolution of risk premia. The result of the repeated frustration with the stabilization attempts is that expected policy reforms which would be forthcoming following successful stabilization had to be postponed in each episode. Confidence in the improvement of the domestic scenario has thus been eluded several times leading to a premium on the correct timing.

Quality of flows should improve with the decrease in the probability of bad scenarios. That means that higher confidence in the progress of economic reforms should increase the share of FDI in total capital inflows.

Table 3.2 shows the share of direct investment in the capital inflows (both gross and net) in a monthly basis for 1992 through 1995, which may be read as a measure for the "quality of flows". For the last two years, figure 3.1 show the behavior of the net investment share in the net inflows plotted with the contemporaneous measure of risk assessment as described above.

A further exploration of this type of comparison relating the time path of economic policy with the behavior of the quality of inflows should help to assess the responsiveness of the flows to expectations on economic policy "fundamentals".

3.4 Econometric evidence on the long run effect of FDI

Gonzaga, Issler and Marone (PUC Discussion Paper 348, December 1995) in the context of assessing the relative importance of transitory and permanent shocks affecting the path of Brazilian GDP use co-integration analysis to measure the long run impact of FDI on output growth. Although they take the annual behavior of FDI in

constant (deflated by what they call a "general price index") dollars as a proxy for overall policy credibility, they conclude: taken together with a general illiteracy index (illiterates as a proportion of the PEA - potential workforce?) and average schooling of the working force, they find a long run elasticity of 1/6.

4. Sectoral aspects of FDI

The following data is presented on tables 4.1 through 4.12:

- sectoral breakdown of the stock of foreign investment - agric, industry 83/95.2
- sectoral breakdown for manufacturing industry 75/80/85/ 90-95
- sectoral breakdown for growth rates--and BNDES disbursements

a) One argument for the desirability of FDI relatively to monetary inflows is their welcome "real investment impact" as opposed to unwelcome monetary and foreign-exchange markets impacts of financial inflows: expansionary demand and appreciation.

b) In the case of Brazil, FDI without money means import of capital goods which have a direct sectoral impact, which vears on the development of the capital goods industry; increase the demand for protection. Therefore, there are factors beyond macropolicies which may play a role in the judgement of the desired composition of foreign capital.

A brief look into broad sector destination show that the share of manufacturing industry has fallen from the late eighties (71%) to mid nineties (55.4). Services seems to absorb higher and higher share. Within manufacturing industry, there has been a noticeable increase in transport equipment and a decrease in tobacco.

c) What does the past behavior of foreign investment data tell us? In view of the role played by industrial policies and administrative credit allocation in the Brazilian economy in the

seventies and the eighties, two possible hypotheses concerning the behavior of foreign investment may be tested:

(i) follow the leader: in view of the high risk of LR investment projects, preferred sectors as evidenced by BNDES credit allocation (see table 4.1) may be more attractive, as they may be judged as more likely to receive preferential treatment: continuity of projects, protection in case of external trouble, for example.

(ii) fill in the blanks: low priority sectors may be those where profitability attracts private investment without the need of government support through official credit -therefore data should evidence complementarity.

A closer look into the behavior of the sectoral data will be attempted in search for a better understanding of the available evidence. The precarious nature of the stocks data is something which will have to be dealt with.

5. Policy conclusions and pending issues

a) Brazilian experience is rich and varied. In the past, nationalism, control of capital flight and dirigist industrial policy has been the rule. More recent is somewhere in between Mexican liberalization of capital account uncertainties derived of flexible exchange rate and Argentina's fixed exchange rate with full convertibility. In both cases, and Brazil is no exception, fiscal discipline seems essential to signal favorable scenarios.

b) Are there policy lessons which tell us how to prevent capital from fleeing the country in bad times? Capital flight was low before 1986, even at the worst of the early eighties. At that time external debt was public, and banks money was tied to long run investment projects. Do industrial policies make a difference in the composition of inflows? In the late eighties, external

moratorium plus domestic uncertainty with high inflation increased capital flight. Frustrated stabilization attempts plus delay in external debt restructuring are the main reasons behind radical changes in attitudes in the early nineties. Financial openness of neighbors made a difference and so does the composition of supply. At the peak of high uncertainty, after the Collor I hijacking of domestic financial assets, liberalization of rules and high interest rates were essential element for stabilization. But abundance of external liquidity makes quite a difference.

c) What can be said of the supply-side determinants, of the impact of financial innovations? Does the size of the economy make a difference in today's flows as it did in the early eighties? Are there limits to explore the attractiveness of a large country whose bankruptcy entails a systemic risk?

d) Following the Mexican crisis of 1994/95, pragmatic policies concerning both exchange rate regime and the need to discourage volatile short term capital when excessive appreciation threatened trade balance prospects and enhanced catastrophic scenarios. Control over appreciation was seen as welcome and suggests that there is some advantage in being a latecomer. Improvement of quality of flows on a permanent basis seem to require more than sensible macropolicies, but also a more permanent and consistent stance concerning the role of private sector in investment process as a whole.

On the topic of policies designed to control capital flows, three issues may be mentioned and explored:

(i) The first one is concerned with conflicting objectives, and may be stated as "to control the volatility while minimizing the obstacles to capital mobility". In the presence of today's facilities to move money to financially open neighbor economies

(Paraguay and Uruguay), the inefficiency of old fashioned controls are clear.

(ii) A related issue is the existence of the so-called "floating rate exchange market" established in December 1988 (Resolution 1532) through which most transactions are made, that were set before at the old "parallel" or "black market" rates. The trend of liberalization in the past years has been a progressive legalization of all transactions. In practical terms, only tax evasion and other illegal activities such as drug-related payments are today made through the parallel market. Two policy alternatives have been discussed in this context: the abolition or the adoption of stricter controls of transactions in the floating rate market; or the abandonment of the current practice, by the Central Bank to equalize the rates of exchange in the commercial and the floating markets. In presence of a serious run against the Real, resort to the dual market (by simply letting the gap between the two rates widen, as in the 1980s) would impose a higher cost on capital flight, thereby creating an automatic "tax" on transfers abroad.

(iii) The third one is the dilemma between taxation of high volatile capital movements versus prohibition or a quarantine system. In the early seventies, Brazilian authorities made use of a quarantine system by requiring a deposit during six months, no interest paid at the Central Bank for all foreign loans from private banks. In the recent years, there is a clear preference for taxation as briefly described above.

(iv) Finally, policy discussions on these matters have often involved discussions about the discrimination of controls "by type" of capital, or "by sector of destination", as frequent waves of industrial policy arguments creep in and establish themselves in more respectable clothes in times of balance of payments difficulties.

ANNEX 1

Legislation on Foreign Capital (from Carneiro and Garcia 1995, updated).

a) **Sociedades de Investimento - Capital Estrangeiro (Investment Companies - Foreign Capital):**

These companies were created and regulated by the Annex I of Resolution 1289 of the National Monetary Council, dated 03/20/87. These companies may be composed of individuals or legal entities resident, domiciled or with head-offices abroad, with the aim to invest in Brazilian variable income securities. The investments have to be managed by a Brazilian financial institution authorized by CVM (the Brazilian SEC).

As companies they are regulated by the appropriate law of public companies (Lei das S.A.), which is very demanding for an investment fund. All investments shall be subject to registration at the Central Bank to allow for later repatriation of cash dividends and capital gains. The minimum percentage invested in shares or convertible debentures is 50%. Capital gains are exempted from income tax, but cash dividends and monetary payments are currently taxed at a 15% rate.

The total amount of funds in these companies is quite small, US\$ 52.87 million (November/95).

b) **Fundos de Investimento - Capital Estrangeiro (Investment Funds - Foreign Capital):**

These Funds were created and regulated by the Annex II of Resolution 1289 of the National Monetary Council, dated 03/20/87. These funds may be composed of foreign individuals, corporations or

other collective investment entities organized abroad resident, domiciled or with head-offices abroad, with the aim to invest in Brazilian securities. These Funds shall be managed solely by an investment bank, brokerage house or securities house authorized by the CVM.

All investments shall be subject to registration at the Central Bank to allow for later repatriation of dividends and capital gains. The minimum percentage invested in stocks is 70%. Capital gains are exempted from income tax, but monetary payments are currently taxed at a 15% rate.

The total amount of funds in these funds is quite small, US\$ 275.11 million (November/95).

Besides (a) and (b), the Resolution 1289 in its Annex III created and regulated the Carteira de Títulos e Valores Mobiliários (Bonds and Securities Portfolios maintained in Brazil). Currently, this option is hardly used. The total amount invested through Annex III, Funds of Foreign Capital Conversion and Privatization Funds - Foreign Capital amounts to US\$ 266.51 million (November 1995).

c) Carteiras de Valores Mobiliários (Securities Portfolios for Institutional Investors):

These Portfolios are the most widely used instrument to invest in Brazilian stock and derivative markets. They were created and regulated by the Annex IV of Resolution 1289. Annex IV was actually enacted by Resolution 1832, dated 05/31/91. Only foreign institutional investors may invest in those Portfolios. Examples of institutional investors that qualify for the use of the Annex IV are Pension Funds, Portfolios belonging to Financial Institutions, Insurance Companies, and Foreign Investment Funds. The management of the portfolio will be undertaken by the institution operating in Brazil and granted authorization by the

CVM. Through Annex IV, Foreign Mutual Funds were able to invest in the Brazilian stock markets, each one forming its own portfolio. Previously they would have to invest in other mutual funds. Also, American mutual funds are forbidden from investing in other mutual funds, to avoid fraudulent schemes.

All investments shall be subject to registration at the Central Bank to allow for later repatriation of dividends and capital gains. Currently, these Portfolios cannot invest in fixed income securities, except in very restricted ones. Those rather restrictive fixed income investments are subject to a 15% withholding income tax. The idea is that all foreign investment in fixed income securities be made through Fixed Income Funds (item (e) below). These Fixed Income Funds pay a 9% "entrance" tax, while the Variable Income Portfolios pay 1%.

Capital gains are exempted from income tax, but monetary payments are currently taxed at a 15% rate.

The total amount of funds in these portfolios is US\$ 17,882.18 million (November/95). This option is by far the most widely used entrance to foreign investment in variable income financial instruments.

d) Depositary Receipts (D.R.):

The Annex V of Resolution 1289, enacted by Resolution 1927, dated 05/18/92, regulates the issuance of the DRs. Until now, DRs have not yet become a widely used option, but their importance is likely to grow in the future as a source of cheaper capital for corporations.

e) Fundos de Renda Fixa - Capital Estrangeiro (Fixed Income Funds for Foreign Investors):

Only through these funds may foreign investors invest in Brazilian private and public fixed income securities. They were created and regulated by Resolution 2034 of the National Monetary Council, dated 12/17/93, and by Circular Letter 2388 of the Central Bank.

These funds may be composed of corporate legal entities domiciled or with head-offices abroad with the aim to invest in Brazilian fixed income securities, as well as foreign mutual funds. The management of these funds may be handled by a multiple bank with an investment portfolio, an investment bank, a stocks and securities brokerage house, or a stocks and securities dealership, under direct responsibility and supervision of the administration of the institution.

The funds assets have to be at least 35% invested in papers issued by the National Treasury or Central bank bonds, and no more than 20% may be invested in fixed-income papers or acceptances by financial institutions. All investments have to be recorded at the Central Bank to allow for later repatriation of yields and capital gains.

Capital gains associated with stock and futures market operations are not subject to withholding tax. All real income (except capital gains on stocks) are subject to 15% withholding income tax. All fixed income investments are currently subject to a 9% tax (IOF - Tax on Financial Transactions). This tax was conceived to deter the capital inflow attracted by the large interest rates in Brazil.

The total amount of funds in these funds is US\$ 3,017 million (November 1995).

f) Contratos de Fechamento de Cambio e Carta Circular Nº 5 (The Exchange Closing Contract and The Central Bank Circular Letter #5 - Foreign Investors Accounts):

The Exchange Closing Contract as well as the Circular Letter # 5 are instruments that foreign investors may use to participate in Brazilian financial and capital markets. The regulations on those options are very lax, but they are not very widely used because they subject the investors to a 25% (variable real income) and 30% (fixed real income) tax, much more than options (c) and (e), the most widely used. A tax on short term (less than 16 work days) financial transactions (IOF) also applies.

Total foreign investments plus reinvestments
Includes all investment lines of activity (in US\$ 1000,00)

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	837098	24389629	237584	0	0	58945	7886332	876938	34286526
Jun-90	858109	24378567	236230	0	0	61180	8579077	924184	35037347
Dec-90	836161	25729204	242729	0	0	63531	9258390	1013357	37143372
Jun-91	791498	24309871	233027	0	0	59398	8914215	1083469	35391478
Dec-91	821050	26156188	358164	0	0	62714	10090540	1091536	38580192
Jun-92	821736	26098484	398398	0	0	65234	11601227	1135515	40120594
Dec-92	793554	25571317	438426	0	0	62675	11974959	1134135	39975066
Jun-93	823311	26776020	321498	0	0	62661	12576384	1293268	41853142
Dec-93	821160	27301129	322386	0	0	65636	17212996	1305411	47028718
Jun-94	823311	28862523	335576	122567	14323	66327	23439843	676731	54341201
Dec-94	1086608	28955022	308656	123374	14278	67537	25252324	741050	56548849
Mar-95	1118401	31450405	324686	128992	14818	68523	22793049	872809	56771683

Percentage in total value

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	2.44%	71.13%	0.69%	0.00%	0.00%	0.17%	23.00%	2.56%	100.00%
Jun-90	2.45%	69.58%	0.67%	0.00%	0.00%	0.17%	24.49%	2.64%	100.00%
Dec-90	2.25%	69.27%	0.65%	0.00%	0.00%	0.17%	24.93%	2.73%	100.00%
Jun-91	2.24%	68.69%	0.66%	0.00%	0.00%	0.17%	25.19%	3.06%	100.00%
Dec-91	2.13%	67.80%	0.93%	0.00%	0.00%	0.16%	26.15%	2.83%	100.00%
Jun-92	2.05%	65.05%	0.99%	0.00%	0.00%	0.16%	28.92%	2.83%	100.00%
Dec-92	1.99%	63.97%	1.10%	0.00%	0.00%	0.16%	29.96%	2.84%	100.00%
Jun-93	1.97%	63.98%	0.77%	0.00%	0.00%	0.15%	30.05%	3.09%	100.00%
Dec-93	1.75%	58.05%	0.69%	0.00%	0.00%	0.14%	36.60%	2.78%	100.00%
Jun-94	1.52%	53.11%	0.62%	0.23%	0.03%	0.12%	43.13%	1.25%	100.00%
Dec-94	1.92%	51.20%	0.55%	0.22%	0.03%	0.12%	44.66%	1.31%	100.00%
Mar-95	1.97%	55.40%	0.57%	0.23%	0.03%	0.12%	40.15%	1.54%	100.00%

All lines of activity

Table 2.6.2

Total foreign investments
Includes all investment lines of activity (in US\$ 1000,00)

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	721941	16102918	142888	0	0	49460	5939715	707059	23663981
Jun-90	734406	15868585	141543	0	0	51153	6561160	747647	24104494
Dec-90	748351	16583754	147443	0	0	53023	7057761	820870	25411202
Jun-91	708036	16035178	138424	0	0	49757	6941455	902966	24775816
Dec-91	733021	16929616	262307	0	0	52355	7868598	899299	26745196
Jun-92	733531	16930117	266542	0	0	54176	9329038	940442	28253846
Dec-92	706893	16917296	281803	0	0	51934	9859747	953080	28770753
Jun-93	733531	18089327	167325	0	0	52153	10653495	1110094	30805925
Dec-93	734560	18652517	168877	0	0	56079	15394756	1124628	36131417
Jun-94	733531	19711831	176352	121917	12169	56390	21478293	541003	42831486
Dec-94	904756	19785968	148776	122720	12151	57446	23259091	602305	44893213
Mar-95	925584	20856959	156790	127959	12372	57900	20533238	724520	43395322

Percentage in total value

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	3.05%	68.05%	0.60%	0.00%	0.00%	0.21%	25.10%	2.99%	100.00%
Jun-90	3.05%	65.83%	0.59%	0.00%	0.00%	0.21%	27.22%	3.10%	100.00%
Dec-90	2.94%	65.26%	0.58%	0.00%	0.00%	0.21%	27.77%	3.23%	100.00%
Jun-91	2.86%	64.72%	0.56%	0.00%	0.00%	0.20%	28.02%	3.64%	100.00%
Dec-91	2.74%	63.30%	0.98%	0.00%	0.00%	0.20%	29.42%	3.36%	100.00%
Jun-92	2.60%	59.92%	0.94%	0.00%	0.00%	0.19%	33.02%	3.33%	100.00%
Dec-92	2.46%	58.80%	0.98%	0.00%	0.00%	0.18%	34.27%	3.31%	100.00%
Jun-93	2.38%	58.72%	0.54%	0.00%	0.00%	0.17%	34.58%	3.60%	100.00%
Dec-93	2.03%	51.62%	0.47%	0.00%	0.00%	0.16%	42.61%	3.11%	100.00%
Jun-94	1.71%	46.02%	0.41%	0.28%	0.03%	0.13%	50.15%	1.26%	100.00%
Dec-94	2.02%	44.07%	0.33%	0.27%	0.03%	0.13%	51.81%	1.34%	100.00%
Mar-95	2.13%	48.06%	0.36%	0.29%	0.03%	0.13%	47.32%	1.67%	100.00%

Source: Banco Central do Brasil
Statistical Supplement

All lines of activity

Table 2.6.3

Total foreign reinvestments
Includes all investment lines of activity (in US\$ 1000,00)

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	837098	8286711	94696	0	0	9485	1946617	169879	11344486
Jun-90	858109	8509982	94687	0	0	10027	2017917	176537	11667259
Dec-90	836161	9145450	95286	0	0	10508	2200629	192487	12480521
Jun-91	791498	8274693	94603	0	0	9641	1972760	180503	11323698
Dec-91	821050	9200525	95857	0	0	10359	2221942	192237	12541970
Jun-92	821736	9164822	131856	0	0	11058	2272189	195073	12596734
Dec-92	793554	8670287	156623	0	0	10741	2115212	181055	11927472
Jun-93	823311	8718308	154173	0	0	10508	1922889	183174	11812363
Dec-93	821160	8643617	153509	0	0	9557	1818240	180783	11626866
Jun-94	823311	9150692	159224	650	2154	9937	1961550	135728	12243246
Dec-94	1086608	9169054	159880	654	2127	10091	1993233	138745	12560392
Mar-95	1118401	10593446	167896	1033	2446	10623	2259820	148289	14301954

Percentage in total value

	Mining	Manufacturing industry	Agriculture	Cattle raising	Fishing	Public utilities	Services	Others	Total
Dec-89	7.38%	73.05%	0.83%	0.00%	0.00%	0.08%	17.16%	1.50%	100.00%
Jun-90	7.35%	72.94%	0.81%	0.00%	0.00%	0.09%	17.30%	1.51%	100.00%
Dec-90	6.70%	73.28%	0.76%	0.00%	0.00%	0.08%	17.63%	1.54%	100.00%
Jun-91	6.99%	73.07%	0.84%	0.00%	0.00%	0.09%	17.42%	1.59%	100.00%
Dec-91	6.55%	73.36%	0.76%	0.00%	0.00%	0.08%	17.72%	1.53%	100.00%
Jun-92	6.52%	72.76%	1.05%	0.00%	0.00%	0.09%	18.04%	1.55%	100.00%
Dec-92	6.65%	72.69%	1.31%	0.00%	0.00%	0.09%	17.73%	1.52%	100.00%
Jun-93	6.97%	73.81%	1.31%	0.00%	0.00%	0.09%	16.28%	1.55%	100.00%
Dec-93	7.06%	74.34%	1.32%	0.00%	0.00%	0.08%	15.64%	1.55%	100.00%
Jun-94	6.72%	74.74%	1.30%	0.01%	0.02%	0.08%	16.02%	1.11%	100.00%
Dec-94	8.65%	73.00%	1.27%	0.01%	0.02%	0.08%	15.87%	1.10%	100.00%
Mar-95	7.82%	74.07%	1.17%	0.01%	0.02%	0.07%	15.80%	1.04%	100.00%

Source: Banco Central do Brasil
Statistical Supplement

Total foreign investment plus reinvestments
Includes participation by region (in US\$ 1000,00)

	EUA	Europe	Caribbean	Total
Dec-89	10224388	16230484	1764885	28219757
Jun-90	10213193	16857897	1900611	28971701
Dec-90	10487650	18442347	1743013	30673010
Jun-91	10514894	16413426	1860871	28789191
Dec-91	10959176	18558222	2001406	31518804
Jun-92	12452401	19566099	1236407	33254907
Dec-92	12180893	18316323	2196922	32694138
Jun-93	12884914	18822515	2901014	34608443
Dec-93	14896800	19922754	4892083	39711637

Percentage in total value

	EUA	Europe	Caribbean	Total
Dec-89	36.23%	57.51%	6.25%	100.00%
Jun-90	35.25%	58.19%	6.56%	100.00%
Dec-90	34.19%	60.13%	5.68%	100.00%
Jun-91	36.52%	57.01%	6.46%	100.00%
Dec-91	34.77%	58.88%	6.35%	100.00%
Jun-92	37.45%	58.84%	3.72%	100.00%
Dec-92	37.26%	56.02%	6.72%	100.00%
Jun-93	37.23%	54.39%	8.38%	100.00%
Dec-93	37.51%	50.17%	12.32%	100.00%

Europe includes: Germany, Belgium, Spain, France, Italy, Luxemburg, Netherlands, Portugal, United Kingdom, Denmark, Greece, Austria, Malta, Norway, Sweden, Switzerland, Finland, Ireland, Iceland, Yugoslavia, Liechtenstein, Poland, Estonia, Gibraltar, Czech Republic, Hungary and Russia.
Caribbean includes: Costa Rica, Panama, Netherlands Antilles, The Bahamas, Bermuda, Cayman Islands, Barbados, Dominican Republic, Virgin Islands, British Virgin Islands and French Guiana.

Total foreign investment
Includes participation by region (in US\$ 1000,00)

	EUA	Europe	Caribbean	Total
Dec-89	7149817	10273478	1327651	18750946
Jun-90	7134472	10575472	1398259	19108203
Dec-90	7381478	11434925	1429298	20245701
Jun-91	7421882	10603368	1464243	19489493
Dec-91	7809455	11736029	1597381	21142865
Jun-92	9195689	12518612	1087194	22801495
Dec-92	9041556	12001684	1818546	22861786
Jun-93	9779912	12673938	2436530	24890380
Dec-93	11888165	13902720	4438739	30229624

Percentage in total value

	EUA	Europe	Caribbean	Total
Dec-89	38.13%	54.79%	7.08%	100.00%
Jun-90	37.34%	55.35%	7.32%	100.00%
Dec-90	36.46%	56.48%	7.06%	100.00%
Jun-91	38.08%	54.41%	7.51%	100.00%
Dec-91	36.94%	55.51%	7.56%	100.00%
Jun-92	40.33%	54.90%	4.77%	100.00%
Dec-92	39.55%	52.50%	7.95%	100.00%
Jun-93	39.29%	50.92%	9.79%	100.00%
Dec-93	39.33%	45.99%	14.68%	100.00%

Europe includes: Germany, Belgium, Spain, France, Italy, Luxemburg, Netherlands, Portugal, United Kingdom, Denmark, Greece, Austria, Malta, Norway, Sweden, Switzerland, Finland, Ireland, Iceland, Yugoslavia, Liechtenstein, Poland, Estonia, Gibraltar, Czech Republic, Hungary and Russia.
Caribbean includes: Costa Rica, Panama, Netherlands Antilles, The Bahamas, Bermuda, Cayman Islands, Barbados, Dominican Republic, Virgin Islands, British Virgin Islands and French Guiana.

Total foreign investments plus reinvestment
Includes participation in the manufacturing industry line of activity (in US\$ 1000,00)

	Nonmetallic mineral industry	Metallurgy	Mechanics	Electrical and comm. equip.	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals	Medicinal	Textiles	Clothing	Footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	574024	2695378	2891585	2925069	3844818	471342	740189	983182	4380974	1534571	487817	253982	1520076	162692	317562	90326	516042	24389629	
Jun-90	596185	2730084	2903803	2992754	3473074	480354	738609	1038915	4495330	1530116	509735	257048	1608297	154069	260465	91032	518497	24378567	
Dec-90	635223	3028151	3036896	3144299	3702695	228362	764077	934904	5054138	1626854	551673	267184	1682847	158193	269010	94601	550097	25729204	
Jun-91	607926	2904188	2869943	2942353	3374405	229361	752771	877625	4811609	1562409	509040	257978	1565712	157923	257509	90467	538652	24309871	
Dec-91	638446	3107914	3079484	3173578	3624710	237308	778769	1135076	5127437	1655163	546480	275904	1671543	165952	270722	94418	573374	26156188	
Jun-92	638033	2854987	3017540	3256879	3687877	249382	732282	977684	5309277	1667027	544798	279064	1743363	181372	270655	88400	579964	26098484	
Dec-92	592769	2912559	2884595	3185452	3568674	247559	741148	892748	5173492	1641613	552270	282118	1791759	181774	265127	85148	572532	25571317	
Jun-93	568172	3033433	2815074	3156149	4743383	250615	734340	900290	5090679	1712312	574943	285677	1811288	188871	245566	85901	579327	26776020	
Dec-93	566618	2931417	2855904	3169246	5222489	240126	754841	901438	5252984	1702969	572386	220149	1833413	181359	238485	82633	574672	27301129	
Jun-94	616863	3062042	2981024	3416060	5469707	297050	769798	931436	5610111	1749818	624662	256715	1901270	186616	254360	87215	647776	28862523	
Dec-94	626805	3077485	3059012	3381143	5587197	298752	755765	938235	5486901	1708830	641605	263171	1920659	187300	256312	86769	679081	28955022	
Mar-95	680257	3224452	3254595	3613460	5944718	305341	787085	983466	5648909	1772957	489855	283834	2026938	243532	265332	89015	1836659	31450405	

Percentage in total value

	Nonmetallic mineral industry	Metallurgy	Mechanics	Electrical and comm. equip.	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals	Medicinal	Textiles	Clothing	Footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	2.35%	1.93%	11.86%	11.99%	15.76%	11.03%	3.03%	4.03%	17.96%	6.29%	2.00%	1.04%	6.23%	0.67%	1.30%	0.37%	2.12%	100.00%	
Jun-90	2.45%	1.97%	11.91%	12.28%	14.25%	11.20%	3.05%	4.26%	18.44%	6.28%	2.09%	1.05%	6.60%	0.63%	1.07%	0.37%	2.13%	100.00%	
Dec-90	2.47%	0.89%	11.80%	12.22%	14.39%	11.77%	2.97%	3.63%	19.64%	6.32%	2.14%	1.04%	6.54%	0.61%	1.05%	0.37%	2.14%	100.00%	
Jun-91	2.50%	0.94%	11.81%	12.10%	13.88%	11.95%	3.10%	3.61%	19.79%	6.43%	2.09%	1.06%	6.44%	0.63%	1.06%	0.37%	2.22%	100.00%	
Dec-91	2.44%	0.91%	11.77%	12.13%	13.86%	11.88%	2.98%	4.34%	19.60%	6.33%	2.09%	1.05%	6.39%	0.63%	1.04%	0.36%	2.19%	100.00%	
Jun-92	2.44%	0.96%	11.56%	12.48%	14.13%	10.94%	2.88%	3.75%	20.34%	6.39%	2.09%	1.07%	6.68%	0.69%	1.04%	0.34%	2.22%	100.00%	
Dec-92	2.32%	0.97%	11.28%	12.46%	13.96%	11.39%	2.90%	3.49%	20.23%	6.42%	2.16%	1.07%	7.01%	0.71%	1.04%	0.33%	2.24%	100.00%	
Jun-93	2.12%	0.94%	10.51%	11.79%	17.72%	11.33%	2.74%	3.36%	19.01%	6.39%	2.15%	1.07%	6.76%	0.71%	0.92%	0.32%	2.16%	100.00%	
Dec-93	2.08%	0.88%	10.46%	11.61%	19.13%	10.74%	2.76%	3.30%	19.24%	6.24%	2.10%	0.81%	6.72%	0.66%	0.87%	0.30%	2.10%	100.00%	
Jun-94	2.14%	1.03%	10.33%	11.84%	18.95%	10.61%	2.67%	3.23%	19.44%	6.06%	2.16%	0.89%	6.59%	0.65%	0.88%	0.30%	2.24%	100.00%	
Dec-94	2.16%	1.03%	10.56%	11.68%	19.30%	10.63%	2.61%	3.24%	18.95%	5.90%	2.22%	0.91%	6.63%	0.65%	0.89%	0.30%	2.35%	100.00%	
Mar-95	2.16%	0.97%	10.35%	11.49%	18.90%	10.23%	2.50%	3.13%	17.96%	5.64%	1.56%	0.90%	6.44%	0.77%	0.84%	0.28%	5.84%	100.00%	

Total foreign investments
Includes participation in the manufacturing industry line of activity (in US\$ 1000,00)

	Nonmetallic mineral industry	Metalurgy	Mechanics	Electrical and comm. equip	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals	Medicinal	Textiles	Clothing, footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	277555	2008274	2092404	2116264	2334843	362465	434322	477117	2807136	1143355	263618	204334	538388	130683	239487	51786	420887	16102918
Jun-90	281833	2047429	2096380	2181516	2098043	367327	429682	497241	2853202	1151501	279649	203841	587410	136683	181356	51453	422039	15868385
Dec-90	296719	2290520	2190926	2281211	2195288	112741	437731	500563	3108097	1236485	297894	213855	598116	139790	185120	53097	445601	16583754
Jun-91	312675	2232582	2098722	2150447	2121792	112167	440560	461852	3044126	1161993	286506	208667	585826	140723	181311	51312	443917	16035178
Dec-91	322251	2365640	2210069	2303241	2204432	117922	454891	565468	3229930	1205174	299388	223828	603757	147447	186662	53014	462549	16955663
Jun-92	324098	2165497	2217397	2296720	2243870	130026	427335	540176	3307715	1208903	297700	227249	680359	162869	186613	47273	467662	16933662
Dec-92	307089	2212207	2126849	2261936	2223986	128769	428844	525701	3306864	1194371	319953	231772	765012	163209	184461	47827	472180	16901030
Jun-93	295209	2342306	2156831	2186602	3266230	129193	423890	533027	3269085	1240447	326760	235953	788347	170534	166762	48960	477576	18057712
Dec-93	295722	2276863	2186322	2205837	3762774	119386	445110	534764	3440741	1231972	328698	169311	813349	163200	162122	47489	473852	18657512
Jun-94	322163	2381438	2273010	2388639	3856764	174283	455505	555321	3715728	1279003	337721	203653	825318	167817	189806	51649	534013	19711831
Dec-94	326672	2389180	2344975	2352907	3945383	176071	440115	561399	3640490	1239581	351648	209516	833836	168347	191104	51211	563533	19785968
Mar-95	348470	2491982	2490838	2493490	4104803	179080	465204	594578	3793492	1287852	293949	218946	847243	223768	196792	52299	774173	20856959

Percentage in total value

	Nonmetallic mineral industry	Metalurgy	Mechanics	Electrical and comm. equip	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals	Medicinal	Textiles	Clothing, footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	1.72%	12.47%	12.99%	13.14%	15.74%	2.25%	2.70%	2.96%	17.43%	7.10%	1.64%	1.27%	3.34%	0.81%	1.49%	0.32%	2.61%	100.00%
Jun-90	1.78%	12.90%	13.21%	13.75%	13.22%	2.31%	2.71%	3.13%	17.98%	7.26%	1.76%	1.30%	3.70%	0.86%	1.14%	0.32%	2.66%	100.00%
Dec-90	1.79%	13.81%	13.21%	13.76%	13.24%	0.68%	2.64%	3.02%	18.74%	7.46%	1.80%	1.29%	3.61%	0.84%	1.12%	0.32%	2.69%	100.00%
Jun-91	1.95%	13.92%	13.09%	13.41%	13.23%	0.70%	2.75%	2.88%	18.98%	7.25%	1.79%	1.30%	3.65%	0.88%	1.13%	0.32%	2.77%	100.00%
Dec-91	1.90%	13.95%	13.03%	13.58%	13.00%	0.70%	2.68%	3.33%	19.05%	7.11%	1.77%	1.32%	3.56%	0.87%	1.10%	0.31%	2.73%	100.00%
Jun-92	1.91%	12.79%	13.09%	13.56%	13.26%	0.77%	2.52%	3.19%	19.53%	7.14%	1.76%	1.34%	4.02%	0.96%	1.10%	0.28%	2.76%	100.00%
Dec-92	1.82%	13.09%	12.58%	13.38%	13.16%	0.76%	2.54%	3.11%	19.57%	7.07%	1.89%	1.37%	4.53%	0.97%	1.09%	0.28%	2.79%	100.00%
Jun-93	1.63%	12.97%	11.94%	12.11%	18.09%	0.72%	2.35%	2.95%	18.10%	6.87%	1.81%	1.31%	4.37%	0.94%	0.92%	0.27%	2.64%	100.00%
Dec-93	1.59%	12.20%	11.72%	11.82%	20.17%	0.64%	2.39%	2.87%	18.44%	6.60%	1.76%	0.91%	4.36%	0.87%	0.87%	0.25%	2.54%	100.00%
Jun-94	1.63%	12.08%	11.53%	12.12%	19.57%	0.88%	2.31%	2.82%	18.83%	6.49%	1.71%	1.03%	4.19%	0.85%	0.96%	0.26%	2.71%	100.00%
Dec-94	1.65%	12.08%	11.85%	11.89%	19.94%	0.89%	2.22%	2.84%	18.40%	6.26%	1.78%	1.06%	4.21%	0.85%	0.97%	0.26%	2.85%	100.00%
Mar-95	1.67%	11.95%	11.94%	11.96%	19.68%	0.86%	2.23%	2.85%	18.19%	6.17%	1.41%	1.05%	4.06%	1.07%	0.94%	0.25%	3.71%	100.00%

Total foreign reinvestments
Includes participation in the manufacturing industry line of activity (in US\$ 1000,00)

	Nonmetallic mineral industry	Metalurgy	Mechanics	Electrical and comm. equip.	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals/Medicinal	Textiles	Clothing, footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	296469	687104	799181	808805	1309975	108877	305867	506065	1573838	391216	224199	981688	32009	78075	38540	95155	8286711
Jun-90	314352	682655	807423	811238	1375031	113227	308927	541674	1642128	378615	230086	1020887	17386	79109	39579	96458	8509982
Dec-90	338504	737631	845970	865088	1507407	115621	326346	434341	1946041	390369	253779	1084731	18403	83890	41504	104496	9145450
Jun-91	295251	671606	771221	791906	1252613	117194	312211	415773	1767483	400416	222534	979886	17200	76198	39155	94735	8274693
Dec-91	316195	742274	869415	870337	1420278	119386	323788	569608	1897507	449989	247092	1067786	18505	84060	41404	110825	9200525
Jun-92	313935	689490	800143	960159	1442007	119356	324747	437508	2001562	458124	247098	1062904	18503	84042	41127	112302	9164822
Dec-92	285680	700352	757746	925116	1344688	118790	312304	367047	1866628	447242	232317	1026727	18565	80666	37321	100352	8670287
Jun-93	272963	691127	658243	969547	1477153	121422	310450	367263	1821594	471865	248183	1022941	18337	78804	36941	101751	8718308
Dec-93	270896	654554	669582	963409	1459715	120740	309731	366674	1812243	470997	243688	1020064	18159	76363	35144	100820	8643617
Jun-94	294700	680604	708014	1027421	1612943	122767	314293	376115	1894383	470815	286941	1075952	18799	64554	35566	113763	9150692
Dec-94	300133	688305	714037	1028236	1641814	122681	315650	376836	1846411	469249	289957	1086823	18953	65208	35558	115548	9169054
Mar-95	331787	732470	763757	1119970	1839915	126261	321881	388888	1855417	485105	195906	1179695	19764	68540	36716	1062486	10593446

Percentage in total value

	Nonmetallic mineral industry	Metalurgy	Mechanics	Electrical and comm. equip.	Transportation equipment	Wood	Cellulose, paper	Rubber	Chemicals/Medicinal	Textiles	Clothing, footwear	Food products	Beverage	Tobacco	Publishing	Sundry	Total
Dec-89	3.58%	8.29%	9.64%	9.76%	15.81%	1.31%	3.69%	6.11%	18.99%	4.72%	2.71%	11.85%	0.39%	0.94%	0.47%	1.15%	100.00%
Jun-90	3.69%	8.07%	9.49%	9.43%	16.16%	1.33%	3.63%	6.37%	19.30%	4.45%	2.70%	12.00%	0.20%	0.93%	0.47%	1.13%	100.00%
Dec-90	3.70%	8.07%	9.25%	9.44%	16.48%	1.26%	3.57%	4.75%	21.28%	4.27%	2.77%	11.86%	0.20%	0.92%	0.45%	1.14%	100.00%
Jun-91	3.57%	8.12%	9.32%	9.37%	15.14%	1.42%	3.77%	5.02%	21.36%	4.84%	2.69%	11.84%	0.21%	0.92%	0.47%	1.14%	100.00%
Dec-91	3.44%	8.07%	9.45%	9.46%	15.44%	1.30%	3.52%	6.19%	20.62%	4.89%	2.69%	11.61%	0.20%	0.91%	0.45%	1.20%	100.00%
Jun-92	3.43%	7.52%	8.73%	10.48%	15.73%	1.30%	3.54%	4.77%	21.84%	5.00%	2.70%	11.60%	0.20%	0.92%	0.45%	1.23%	100.00%
Dec-92	3.29%	8.08%	8.74%	10.65%	15.51%	1.37%	3.60%	4.23%	21.53%	5.16%	2.68%	11.84%	0.21%	0.93%	0.43%	1.16%	100.00%
Jun-93	3.13%	7.93%	7.55%	11.12%	16.94%	1.39%	3.56%	4.21%	20.89%	5.41%	2.85%	11.73%	0.21%	0.90%	0.42%	1.17%	100.00%
Dec-93	3.13%	7.57%	7.75%	11.15%	16.89%	1.40%	3.58%	4.24%	20.97%	5.45%	2.82%	11.80%	0.21%	0.88%	0.41%	1.17%	100.00%
Jun-94	3.22%	7.44%	7.74%	11.23%	17.63%	1.34%	3.43%	4.11%	20.70%	5.15%	3.14%	11.76%	0.21%	0.71%	0.39%	1.24%	100.00%
Dec-94	3.27%	7.51%	7.79%	11.21%	17.91%	1.34%	3.44%	4.11%	20.14%	5.12%	3.16%	11.85%	0.21%	0.71%	0.39%	1.26%	100.00%
Mar-95	3.13%	6.91%	7.21%	10.57%	17.37%	1.19%	3.04%	3.67%	17.51%	4.58%	1.85%	11.14%	0.19%	0.65%	0.35%	10.03%	100.00%

Total foreign investments plus reinvestments
Includes participation in the services line of activity (in US\$ 1000,00)

	Real property busines	Investment banks and C	Insurence Co.	Tourism	Consulting	Tec. services and auditin	General trade	Portfolio	Total
Dec-89	150540	2030087	120207	39172	3983264	223376	1339686	0	7886332
Jun-90	154170	2042914	113134	55662	4535617	224775	1452805	0	8579077
Dec-90	160522	2230574	118602	56401	4920374	233428	1538489	0	9258390
Jun-91	148916	2195733	140134	59252	4658205	229040	1482935	0	8914215
Dec-91	162740	2826508	147102	59438	5114595	239562	1540595	0	10090540
Jun-92	161404	1752062	123515	59502	5116332	269237	1641842	2477333	11601227
Dec-92	123780	1757968	137229	62313	4951384	271092	1676702	2994491	11974959
Jun-93	129938	1814276	161967	62383	4127219	249285	1499236	4532080	12576384
Dec-93	132485	1990362	159502	62372	3600523	217954	1543030	9506768	17212996
Jun-94	143382	1973490	165320	67402	4035983	236615	1702415	15115236	23439843
Dec-94	147349	2020028	167471	67901	4190442	237709	1810279	16611145	25252324
Mar-95	150887	2281801	173238	68809	4421289	247640	1867828	13581557	22793049

Percentage in total value

	Real property busines	Investment banks and C	Insurence Co.	Tourism	Consulting	Tec. services and auditin	General trade	Portfolio	Total
Dec-89	1.91%	2.83%	1.52%	0.50%	50.51%	25.74%	16.99%	0.00%	100.00%
Jun-90	1.80%	2.62%	1.32%	0.65%	52.87%	23.81%	16.93%	0.00%	100.00%
Dec-90	1.73%	2.52%	1.28%	0.61%	53.15%	24.09%	16.62%	0.00%	100.00%
Jun-91	1.67%	2.57%	1.57%	0.66%	52.26%	24.63%	16.64%	0.00%	100.00%
Dec-91	1.61%	2.37%	1.46%	0.59%	50.69%	28.01%	15.27%	0.00%	100.00%
Jun-92	1.39%	2.32%	1.06%	0.51%	44.10%	15.10%	14.15%	21.35%	100.00%
Dec-92	1.03%	2.26%	1.15%	0.52%	41.35%	14.68%	14.00%	25.01%	100.00%
Jun-93	1.03%	1.98%	1.29%	0.50%	32.82%	14.43%	11.92%	36.04%	100.00%
Dec-93	0.77%	1.27%	0.93%	0.36%	20.92%	11.56%	8.96%	55.23%	100.00%
Jun-94	0.61%	1.01%	0.71%	0.29%	17.22%	8.42%	7.26%	64.49%	100.00%
Dec-94	0.58%	0.94%	0.66%	0.27%	16.59%	8.00%	7.17%	65.78%	100.00%
Mar-95	0.66%	1.09%	0.76%	0.30%	19.40%	10.01%	8.19%	59.59%	100.00%

Total foreign reinvestments
Includes participation in the services line of activity (in US\$ 1000,00)

	Real property busines	Investment banks and C	Insurence Co.	Tourism	Consulting	Tec. services and auditin	General trade	Portfolio	Total
Dec-89	14608	451782	50938	4469	1049337	35364	340119	0	1946617
Jun-90	14970	460776	50122	4496	1085545	36526	365482	0	2017917
Dec-90	15969	500816	54152	4606	1182913	37747	404426	0	2200629
Jun-91	14164	457617	49343	4415	1049116	35699	362406	0	1972760
Dec-91	16588	513720	54617	4589	1184055	37470	410903	0	2221942
Jun-92	16550	530333	54474	4604	1186800	38879	440549	0	2272189
Dec-92	17255	498944	49995	4518	1096060	38164	410276	0	2115212
Jun-93	16848	513229	49784	4477	987488	33257	317806	0	1922889
Dec-93	16233	506138	49082	4449	897469	32767	312102	0	1818240
Jun-94	17244	537631	52382	4668	991317	33949	324359	0	1961550
Dec-94	19885	543423	54424	9558	1006100	34066	325777	0	1993233
Mar-95	20391	698048	58192	9688	1085767	35636	352098	0	2259820

Percentage in total value

	Real property busines	Investment banks and C	Insurence Co.	Tourism	Consulting	Tec. services and auditin	General trade	Portfolio	Total
Dec-89	0.75%	1.82%	2.62%	0.23%	53.91%	23.21%	17.47%	0.00%	100.00%
Jun-90	0.74%	1.81%	2.48%	0.22%	53.80%	22.83%	18.11%	0.00%	100.00%
Dec-90	0.73%	1.72%	2.46%	0.21%	53.75%	22.76%	18.38%	0.00%	100.00%
Jun-91	0.72%	1.81%	2.50%	0.22%	53.18%	23.20%	18.37%	0.00%	100.00%
Dec-91	0.75%	1.69%	2.46%	0.21%	53.29%	23.12%	18.49%	0.00%	100.00%
Jun-92	0.73%	1.71%	2.40%	0.20%	52.23%	23.34%	19.39%	0.00%	100.00%
Dec-92	0.82%	1.80%	2.36%	0.21%	51.82%	23.59%	19.40%	0.00%	100.00%
Jun-93	0.88%	1.73%	2.59%	0.23%	51.35%	26.69%	16.53%	0.00%	100.00%
Dec-93	0.89%	1.80%	2.70%	0.24%	49.36%	27.84%	17.17%	0.00%	100.00%
Jun-94	0.88%	1.73%	2.67%	0.24%	50.54%	27.41%	16.54%	0.00%	100.00%
Dec-94	1.00%	1.71%	2.73%	0.48%	50.48%	27.26%	16.34%	0.00%	100.00%
Mar-95	0.90%	1.58%	2.58%	0.43%	48.05%	30.89%	15.58%	0.00%	100.00%

Total foreign investments plus reinvestments
Includes participation in the Public utility service line of activity (in US\$ 1000,00)

	Gas production	Maritime and river transportatio	Highway transport	Airplane transport	Sanitation	Water	Total
Dec-89	48	19637	33583	2902	1649	1126	58945
Jun-90	52	21944	33444	2920	1664	1156	61180
Dec-90	57	22798	31941	5595	1862	1278	63531
Jun-91	49	21907	29986	4838	1551	1067	59398
Dec-91	56	22705	31048	5821	1833	1251	62714
Jun-92	56	24393	31229	6458	1829	1269	65234
Dec-92	45	23771	29779	6187	1718	1175	62675
Jun-93	44	24345	29479	6030	1634	1129	62661
Dec-93	44	22403	34368	6120	1603	1098	65636
Jun-94	46	24649	30673	6511	1756	2692	66327
Dec-94	46	24923	30207	6598	1799	3964	67537
Mar-95	48	25643	29504	7203	2027	4098	68523

Percentage in total value

	Gas production	Maritime and river transportatio	Highway transport	Airplane transport	Sanitation	Water	Total
Dec-89	0.08%	33.31%	56.97%	4.92%	2.80%	1.91%	100.00%
Jun-90	0.08%	35.87%	54.66%	4.77%	2.72%	1.89%	100.00%
Dec-90	0.09%	35.88%	50.28%	8.81%	2.93%	2.01%	100.00%
Jun-91	0.08%	36.88%	50.48%	8.15%	2.61%	1.80%	100.00%
Dec-91	0.09%	36.20%	49.51%	9.28%	2.92%	1.99%	100.00%
Jun-92	0.09%	37.39%	47.87%	9.90%	2.80%	1.95%	100.00%
Dec-92	0.07%	37.93%	47.51%	9.87%	2.74%	1.87%	100.00%
Jun-93	0.07%	38.85%	47.05%	9.62%	2.61%	1.80%	100.00%
Dec-93	0.07%	34.13%	52.36%	9.32%	2.44%	1.67%	100.00%
Jun-94	0.07%	37.16%	46.25%	9.82%	2.65%	4.06%	100.00%
Dec-94	0.07%	36.90%	44.73%	9.77%	2.66%	5.87%	100.00%
Mar-95	0.07%	37.42%	43.06%	10.51%	2.96%	5.98%	100.00%

Total foreign investments plus reinvestment
Includes participation by country (in US\$ 1000,00)

	Costa Rica	Panama	Netherlands Antille	The Bahamas	Bermuda	Cayman Islands	Others	Total
Dec-89	302	838393	326489	152626	216024	208157	22894	1764885
Jun-90	301	939041	345523	138986	186798	225380	64582	1900611
Dec-90	301	776636	362655	118506	186597	224558	73760	1743013
Jun-91	301	851677	363201	121822	186928	246436	90506	1860871
Dec-91	301	859316	415620	127442	188557	307589	102581	2001406
Jun-92	301	506547	157103	160912	76345	333028	2171	1236407
Dec-92	301	864229	418854	231122	209387	470927	2102	2196922
Jun-93	300	964007	453258	397173	199009	777307	109960	2901014
Dec-93	301	985927	550379	841018	195789	2182441	136228	4892083

Percentage in total value

	Costa Rica	Panama	Netherlands Antille	The Bahamas	Bermuda	Cayman Islands	Others	Total
Dec-89	0.02%	47.50%	18.50%	8.65%	12.24%	11.79%	1.30%	100.00%
Jun-90	0.02%	49.41%	18.18%	7.31%	9.83%	11.86%	3.40%	100.00%
Dec-90	0.02%	44.56%	20.81%	6.80%	10.71%	12.88%	4.23%	100.00%
Jun-91	0.02%	45.77%	19.52%	6.55%	10.05%	13.24%	4.86%	100.00%
Dec-91	0.02%	42.94%	20.77%	6.37%	9.42%	15.37%	5.13%	100.00%
Jun-92	0.02%	40.97%	12.71%	13.01%	6.17%	26.94%	0.18%	100.00%
Dec-92	0.01%	39.34%	19.07%	10.52%	9.53%	21.44%	0.10%	100.00%
Jun-93	0.01%	33.23%	15.62%	13.69%	6.86%	26.79%	3.79%	100.00%
Dec-93	0.01%	20.15%	11.25%	17.19%	4.00%	44.61%	2.78%	100.00%

Others includes: Barbados, Dominican Republic, British Virgin Islands, Virgin Islands and French Guiana.

Total foreign reinvestments
Includes participation by country (in US\$ 1000,00)

	Costa Rica	Panama	Netherlands Antille	The Bahamas	Bermuda	Cayman Islands	Others	Total
Dec-89	1	344789	20462	15574	27723	25710	2975	437234
Jun-90	1	437978	13603	6348	14719	27584	2119	502352
Dec-90	1	248740	14534	6545	15193	26555	2147	313715
Jun-91	1	333870	12971	6154	15250	26307	2075	396628
Dec-91	1	336804	14624	6381	15411	24345	6459	404025
Jun-92	0	125183	4611	2052	2012	13511	1844	149213
Dec-92	0	325015	14025	6178	11069	20326	1763	378376
Jun-93	0	394027	14603	5328	23814	20602	6110	464484
Dec-93	0	386326	14553	5041	23197	17974	6253	453344

Percentage in total value

	Costa Rica	Panama	Netherlands Antille	The Bahamas	Bermuda	Cayman Islands	Others	Total
Dec-89	0.00%	78.86%	4.68%	3.56%	6.34%	5.88%	0.68%	100.00%
Jun-90	0.00%	87.19%	2.71%	1.26%	2.93%	5.49%	0.42%	100.00%
Dec-90	0.00%	79.29%	4.63%	2.09%	4.84%	8.46%	0.68%	100.00%
Jun-91	0.00%	84.18%	3.27%	1.55%	3.84%	6.63%	0.52%	100.00%
Dec-91	0.00%	83.36%	3.62%	1.58%	3.81%	6.03%	1.60%	100.00%
Jun-92	0.00%	83.90%	3.09%	1.38%	1.35%	9.05%	1.24%	100.00%
Dec-92	0.00%	85.90%	3.71%	1.63%	2.93%	5.37%	0.47%	100.00%
Jun-93	0.00%	84.83%	3.14%	1.15%	5.13%	4.44%	1.32%	100.00%
Dec-93	0.00%	85.22%	3.21%	1.11%	5.12%	3.96%	1.38%	100.00%

Others includes: Barbados, Dominican Republic, British Virgin Islands, Virgin Islands and French Guiana.