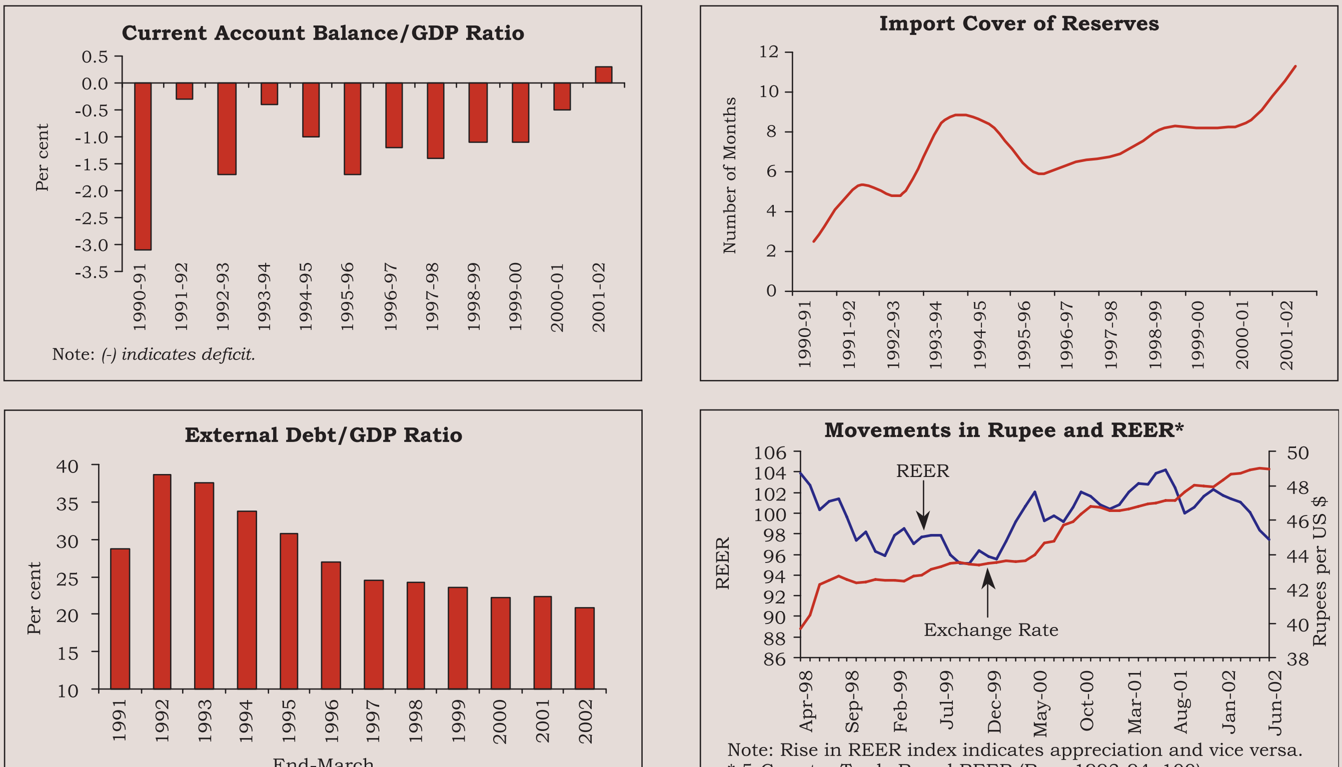
VI EXTERNAL SECTOR

6.1 India's external sector posted significant gains during 2001-02, despite the deepening of the global slowdown and uncertainties owing to September 11, 2001 terrorist attacks. For the sixth year in succession, the balance of payments (BoP) recorded an overall surplus. The current account registered a surplus after a period of more than two decades. The buoyancy in capital flows bolstered the foreign exchange reserves which rose to US $ 54 billion by the end of March 2002, sufficient for financing about 11 months of imports. The increase of US $ 11.8 billion in reserves during the year was the largest accretion in a single year. Indicators of liquidity and sustainability of external debt improved further. The exchange rate of the rupee remained broadly stable during the year, except for an extremely brief period of uncertainty owing to the September 11 events (Chart VI.1).

INTERNATIONAL DEVELOPMENTS

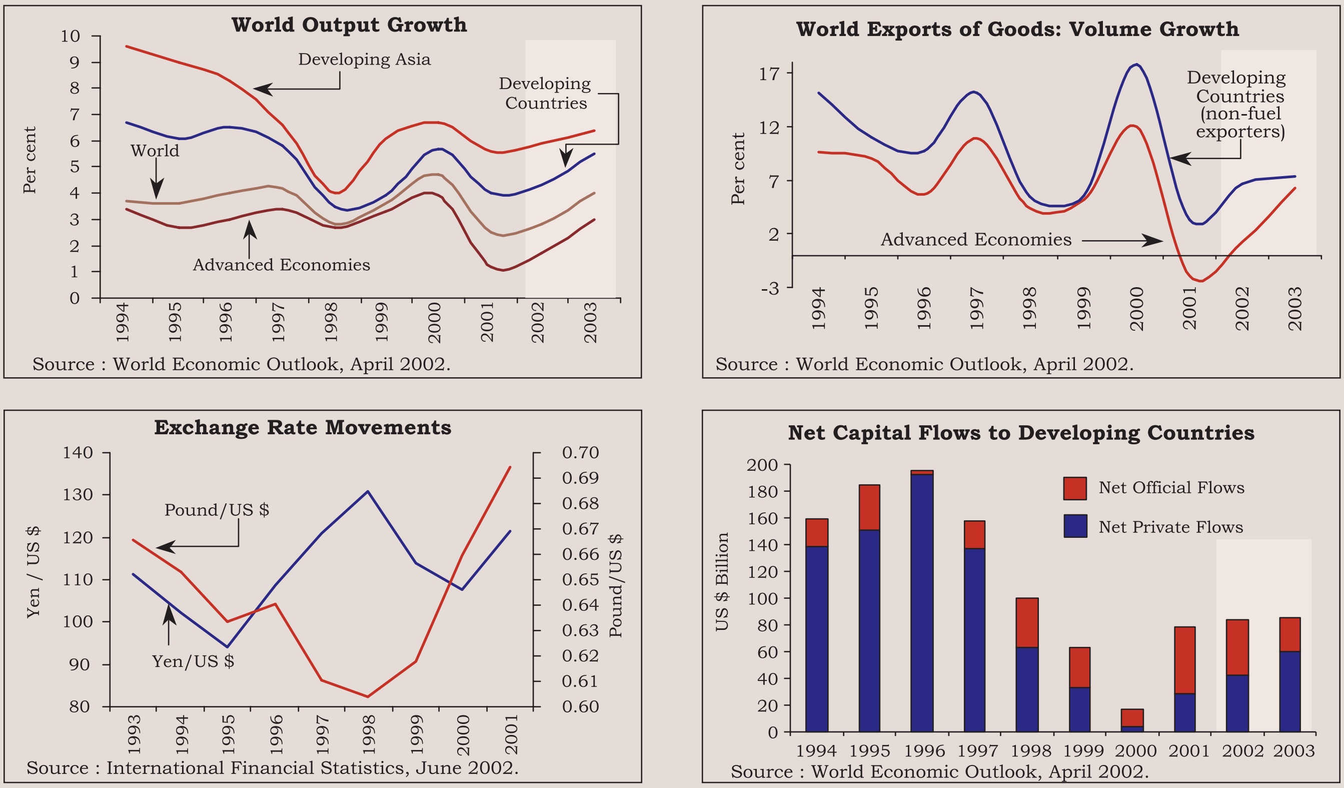
6.2 The deceleration in global economic activity that began during the second half of 2000 intensified during 2001 with all the major regions of the world (excluding Africa) exhibiting a synchronised slowdown. According to the International Monetary Fund (IMF), world output growth is estimated at 2.5 per cent during 2001 as compared with 4.7 per cent during 2000. World trade volume declined by 0.2 per cent in 2001 as against a sharp expansion of 12.4 per cent in the preceding year, partly reflecting the increased cost of transportation of goods following

Chart VI.1 : Key Indicators of External Sector



Note: Rise in REER index indicates appreciation and vice versa.
* 5-Country Trade Based REER (Base:1993-94=100).

Chart VI.2 : International Economic Environment



Source : World Economic Outlook, April 2002.

Source : World Economic Outlook, April 2002.

Source : International Financial Statistics, June 2002.

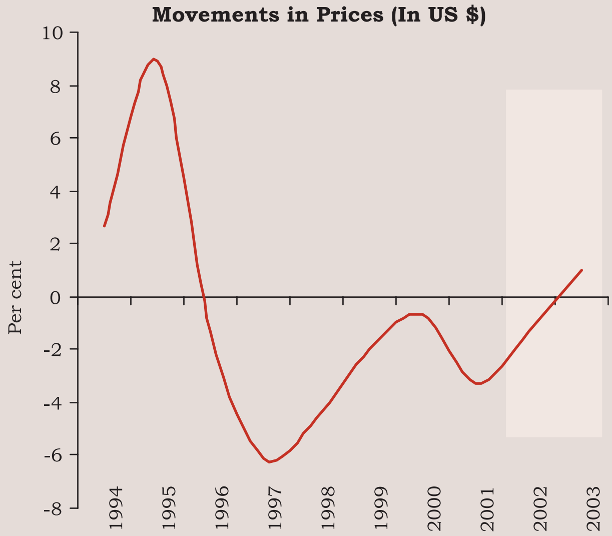
Source : World Economic Outlook, April 2002.

Note : Shaded areas indicate IMF projections.

the terrorist attack and the worsening of the slowdown. Capital flows to developing countries recovered in 2001 mainly on account of higher official flows. The G-3 currencies exhibited considerable volatility during 2001. The Euro continued its downward trend in 2001 and declined from US $ 0.93 at end-December 2000 to US $ 0.88 by end-December 2001, before appreciating marginally to US $ 0.89 at end-April 2002. Subsequently, the Euro appreciated sharply and was US $ 0.99 by end-July 2002. The Japanese yen too exhibited a declining trend during 2001 *vis-à-vis* the US dollar (Chart VI.2 and Appendix Table VI.1).

6.3 For the year 2002, world output growth is projected at 2.8 per cent by the IMF (World Economic Outlook, April 2002). This modest improvement is expected to occur on the basis of (i) the near completion of the inventory correction, (ii) lower international oil prices in relation to their recent peaks, and (iii) recovery-supportive macro-economic and structural polices in advanced economies, with notable easing in monetary policy and to a lesser degree, in fiscal policy. The IMF has also projected a modest recovery in world trade (goods and services) volumes to 2.5 per cent in 2002. Tradable prices (in US dollar terms) are, however, expected to decline further by 1.3 per cent in 2002 on the top of a decline of 3.3 per cent during 2001 (Chart VI.3).

Chart VI.3 : World Trade in Goods and Services : Movements in Prices (In US $)



Note : Shaded area indicates IMF projections.

Source : World Economic Outlook, April 2002.

6.4 The downside to the prospects of economic recovery in the advanced economies are: fragility of the US recovery, large current account deficits in the US, exchange rate misalignment among major currencies, continuing recession in Japan and a pervasive uncertainty in the wake of the September 11 incident. Moreover, monetary policy seems to be approaching a zone of ineffectiveness in terms of stimulating demand through interest rate adjustments and there is very little room for manoeuvre for fiscal easing.

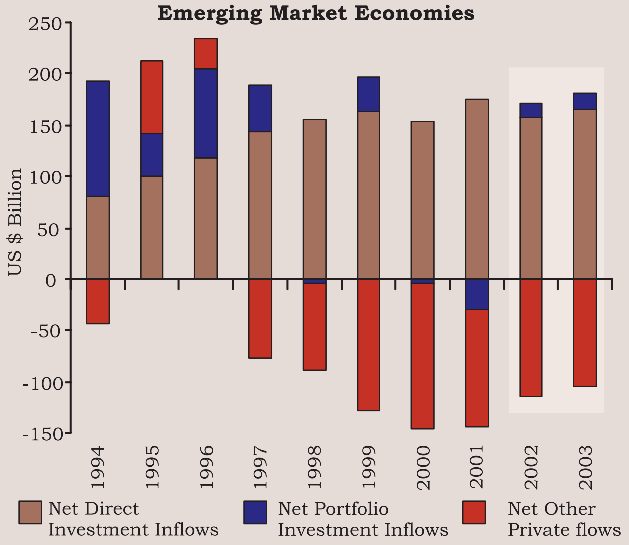
6.5 The growth rate of developing countries, as a group, is expected to increase moderately to 4.3 per cent in 2002 from 4.0 per cent in 2001 in the absence of any direct 'market contagion' from the Argentinean crisis. Spreads on other emerging markets' debt issuances have also declined. In Asia, the recovery in growth is expected to be moderate, reflecting the continued impact of the downturn in the global electronics cycle, downturn in tourism earnings in the aftermath of September 11, and the weakening of the external demand condition on account of the recession in Japan - a major trading partner - and the depreciation of the yen.

6.6 The prospects of capital flows to emerging market economies (EMEs) remain uncertain. The IMF projects a modest increase in the net private capital flows to EMEs to US $ 58.0 billion in 2002 from US $ 31.3 billion in the previous year and US $ 7.7 billion in 2000; they would still be substantially lower than those of US $ 234.2 billion during 1996 and US $ 212.0 billion during 1995. Net private direct investment is, however, projected to decline to US $ 157.1 billion during 2002 from US $ 175.5 billion in 2001 (Chart VI.4).

BALANCE OF PAYMENTS

6.7 Weak external demand adversely affected India's export performance during 2001-02. This was counterbalanced by the listless domestic demand for imports and the softness in international oil prices for a greater part of the year. As a result, the trade deficit, on balance of payments basis, declined from US $ 14.4 billion during 2000-01 to US $ 12.7 billion during 2001-02. The invisible account continued to provide support to the balance of payments with the surplus increasing from US $ 11.8 billion during 2000-01 to US $ 14.1 billion during 2001-02. The current account recorded a surplus of US $ 1.4 billion. Net capital flows were higher at US $ 9.5 billion during 2001-02

Chart VI.4 : Net Private Capital Flows to Emerging Market Economies



Note : Shaded area indicates IMF projections.
Source : World Economic Outlook, April 2002.

(Table 6.1 and Appendix Table VI.2). The share of non-debt creating flows in net capital flows increased to 62.1 per cent in 2001-02 from 56.6 per cent in 2000-01.

Merchandise Trade

6.8 Provisional data of the Directorate General of Commercial Intelligence and Statistics (DGCI&S) indicate that merchandise exports at US $ 43.6 billion declined by 2.2 per cent during 2001-02 after recording a robust growth of 21.0 per cent during the previous year (Chart VI.5). Non-oil exports during 2001-02 declined by 2.9 per cent as against an increase of 16.1 per cent during 2000-01.

6.9 Exports generally declined or decelerated across major commodity groups. Exports of primary products declined by 0.9 per cent during 2001-02 as against an increase of 9.2 per cent during the previous year. Within this group, exports of agricultural and allied products declined by 2.0 per cent. Exports of manufactured products declined by 3.5 per cent during 2001-02 as against the growth of 15.6 per cent during the previous year. Among the major manufactured items suffering declines were leather and manufactures (2.0 per cent), textiles (10.0 per cent), gems and jewellery (1.1 per cent), handicrafts (17.2 per cent) and carpets (13.5 per cent) (Appendix Table VI.4 and Chart VI.6).

6.10 In terms of destinations, exports to the OECD and Eastern Europe countries declined during 2001-02;

Table 6.1 : Balance of Payments : Key Indicators

(US $ million)

Item / Indicator	2001-02	2000-01	1999-2000	1998-99	1990-91
1	2	3	4	5	6
i) Trade Balance	-12,703	-14,370	-17,841	-13,246	-9,437
ii) Invisibles, net	14,054	11,791	13,143	9,208	-243
iii) Current Account Balance	1,351	-2,579	-4,698	-4,038	-9,680
iv) Capital Account	9,545	9,023	10,444	8,435	7,056
v) Overall Balance #	11,757	5,856	6,402	4,222	-2,492
vi) Foreign Exchange Reserves (Increase -, Decrease+)	-11,757	-5,830	-6,142	-3,829	1,278
Indicators (in per cent)					
1. Trade					
i) Exports/GDP	9.3	9.8	8.4	8.3	5.8
ii) Imports/GDP	11.9	13.0	12.4	11.5	8.8
iii) Income Terms of Trade : Growth	..	18.3	3.3	6.4	0.2
iv) Export Volume Growth	..	23.9	15.5	3.4	11.0
2. Invisibles					
i) Invisible Receipts/GDP	7.4	7.6	6.8	6.2	2.4
ii) Invisible Payments/GDP	4.5	5.0	3.9	4.0	2.4
iii) Invisibles (Net)/GDP	2.9	2.6	3.0	2.2	-0.1
3. Current Account					
i) Current Receipts @ / GDP	16.6	17.3	15.2	14.5	8.0
ii) Current Receipts Growth @	1.4	17.1	12.9	2.1	6.6
iii) Current Receipts @ /Current Payments	101.2	96.4	93.0	93.2	71.5
iv) Current Account Balance/GDP	0.3	-0.5	-1.1	-1.0	-3.1
4. Capital Account					
i) Foreign Investment / GDP	1.2	1.1	1.2	0.6	0.03
ii) Foreign Investment / Exports	13.2	11.4	13.8	7.0	0.6
5. Others					
i) Debt-GDP Ratio	20.8	22.3	22.2	23.6	28.7
ii) Debt-Service Ratio	14.1	17.3	16.2	17.8	35.3
iii) Liability-Service Ratio	15.3	18.3	17.0	18.9	35.6
iv) Import Cover of Reserves (in months)	11.3	8.6	8.2	8.2	2.5

Includes errors and omissions. .. Not available. @Excluding official transfers.

on the other hand, exports to the OPEC and the developing countries in Asia and Africa posted increases. Within the OECD group, exports to the US and Japan declined sharply by 8.8 per cent and 16.7 per cent, respectively, during 2001-02. Exports to the developing countries of Africa recorded a strong

Chart VI.5 : Exports Growth

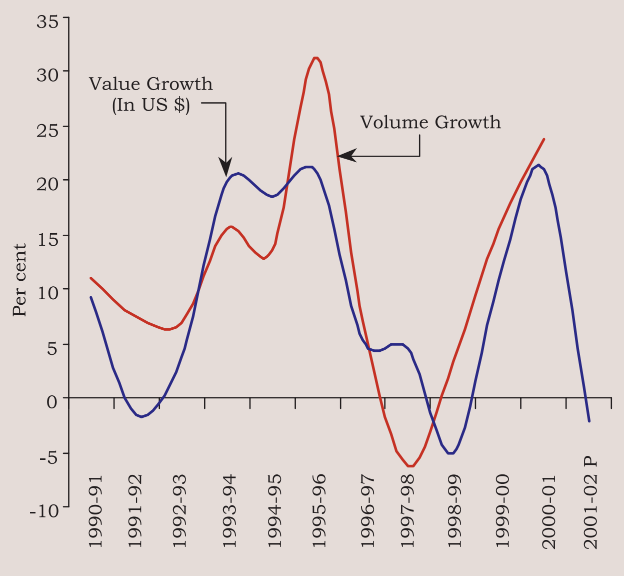
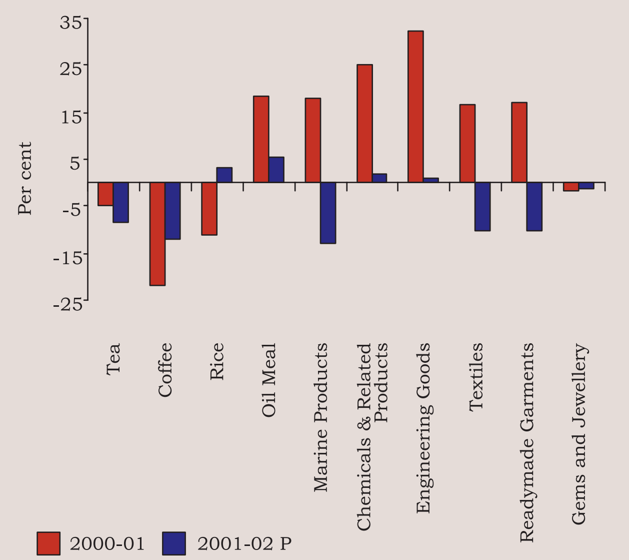
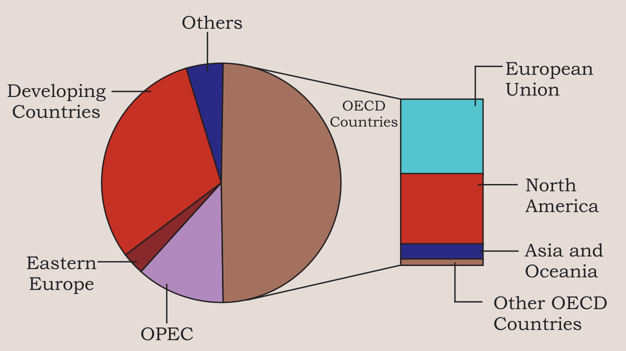


Chart VI.6 : Growth Rates of Exports of Selected Commodities



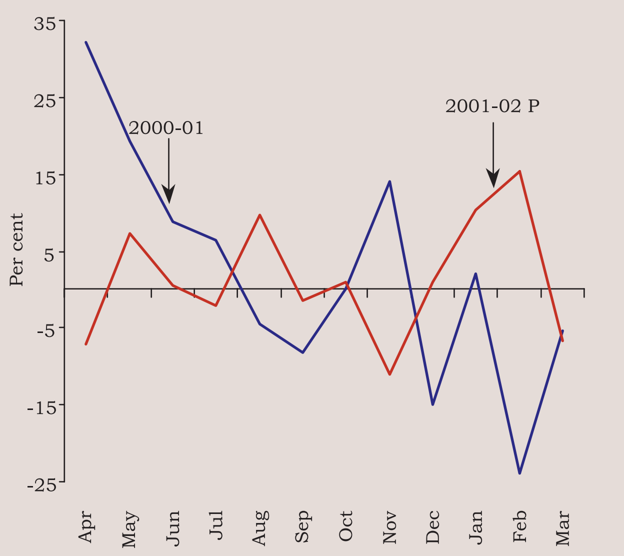
growth of 14.4 per cent during 2001-02 on top of the growth of 25.9 per cent during the previous year. Exports to some of the Asian countries such as Malaysia, Singapore and Thailand also showed increases during 2001-02. While the share of exports to the OECD countries to total exports declined to 49.4 per cent, it increased to 30.7 per cent in the case of developing countries during 2001-02 (Chart VI.7).

Chart VI.7 : Destination of India's Exports during 2001-02



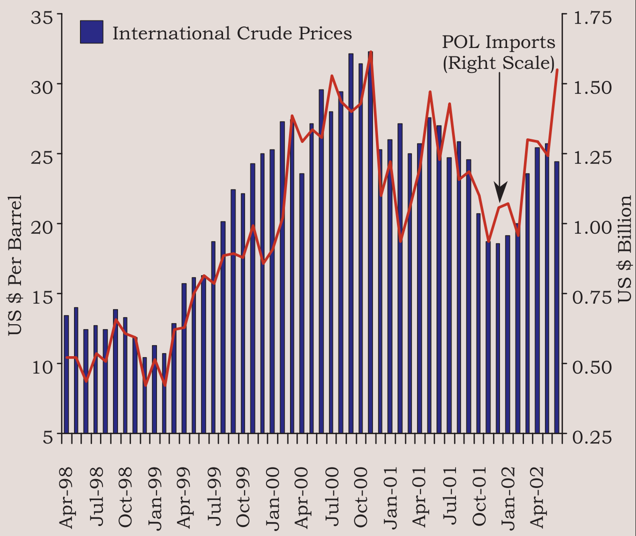
6.11 Imports, at US $ 51.1 billion during 2001-02, recorded an increase of 1.1 per cent as compared with 1.7 per cent during 2000-01 (Appendix Table VI.3 and Chart VI.8).

Chart VI.8 : Monthly Growth Rates of Imports



6.12 Reflecting mainly subdued international prices, oil imports declined by 10.5 per cent during 2001-02 as against the sharp increase of 24.1 per cent during 2000-01. International crude oil prices had declined by 14 per cent from US $ 28.2 per barrel during calendar year 2000 to US $ 24.3 per barrel during 2001. The crude oil prices have, however, increased again during 2002 so far: crude prices averaged US $ 25.2 per barrel during April-June 2002 as compared with US $ 20.9 per barrel during January-March 2002 (Chart VI.9).

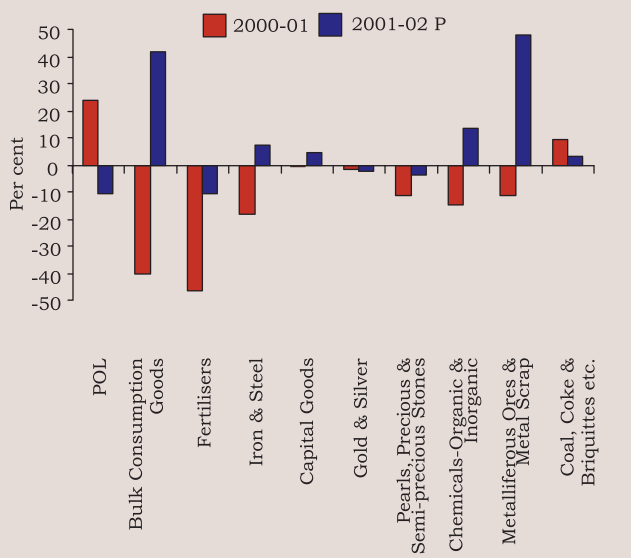
Chart VI.9 : Oil Imports and Crude Prices



6.13 Non-oil imports increased by 6.3 per cent (US $ 2.2 billion) during 2001-02 to US $ 37.1 billion in contrast to the decline of 5.9 per cent (US $ 2.2 billion) recorded during 2000-01. Among 'non-oil' items, imports of bulk consumption goods increased by 41.6 per cent during 2001-02 as against a decline of 40.3 per cent during the previous year. Imports of capital goods recorded an increase of 4.2 per cent during 2001-02 as against a decline of 0.3 per cent during the previous year. Within this sub-group, imports of 'machinery except electrical and electronics' and 'electrical machinery except electronics' registered increases of 9.4 per cent and 23.3 per cent, respectively, during 2001-02. Other import categories that showed sharp increases during 2001-02 were non-ferrous metals (21.1 per cent), metalliferrous ores and metal scraps (47.6 per cent), crude rubber including synthetic and reclaimed (14.7 per cent), organic and inorganic chemicals (13.4 per cent), textile yarns, fabrics *etc.* (24.9 per cent), artificial resins and plastic materials (21.3 per cent), professional, scientific and optical goods (18.0 per cent) and chemical material and products (32.2 per cent).

6.14 The import of gold and silver declined by 2.2 per cent during 2001-02 as compared with a decline of 1.4 per cent during the previous year. Gold and silver imports stood at US $ 4.5 billion during 2001-02 as compared with US $ 4.6 billion during 2000-01. The imports of export-related items such as 'pearls, precious and semi-precious stones' and cashew nuts too showed decline during 2001-02 (Chart VI.10). Non-oil non-gold imports at US $ 32.6 billion during 2001-02 were higher by 7.6 per cent (US $ 2.3 billion) than that in the previous year (Appendix Table VI.5).

Chart VI.10 : Growth Rates of Imports of Selected Commodities

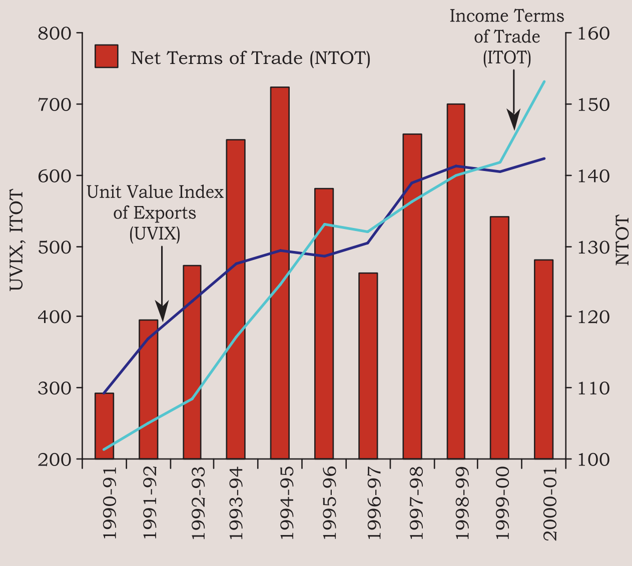


6.15 Net terms of trade worsened by 4.5 per cent during 2000-01 in view of the sharp increase in crude oil prices. Import purchasing power of exports, as measured by income terms of trade, has consistently improved during the 1990s on account of strong export growth in volume terms (Chart VI.11).

6.16 The trade deficit, according to the DGCI&S, widened to US $ 7.5 billion during 2001-02 from that of US $ 6.0 billion during the previous year (Chart VI.12 and Appendix Table VI.3).

6.17 During April-June 2002, exports amounted to US $ 11.5 billion recording a growth of 11.3 per cent over the corresponding period of the previous year. Imports increased by 3.2 per cent to US $ 13.2 billion; while oil imports recorded an increase of 11.4 per cent to US $ 4.3 billion, non-oil imports declined by 0.4 per cent to US $ 8.8 billion. The trade deficit,

Chart VI.11 : Terms of Trade (Index: 1978-79=100)

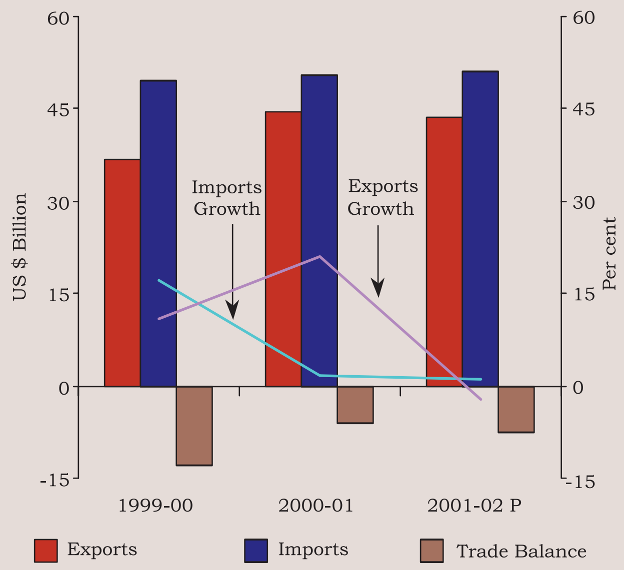


according to the DGCI&S, at US $ 1.7 billion during April-June 2002 was lower than that of US $ 2.4 billion during the corresponding period of the previous year.

Invisibles

6.18 The surplus in the invisibles account at US $ 14.1 billion during 2001-02 was higher by US $ 2.3 billion than that of the previous year mainly on account of higher net inflows in respect of non-factor services (Appendix Table VI.6).

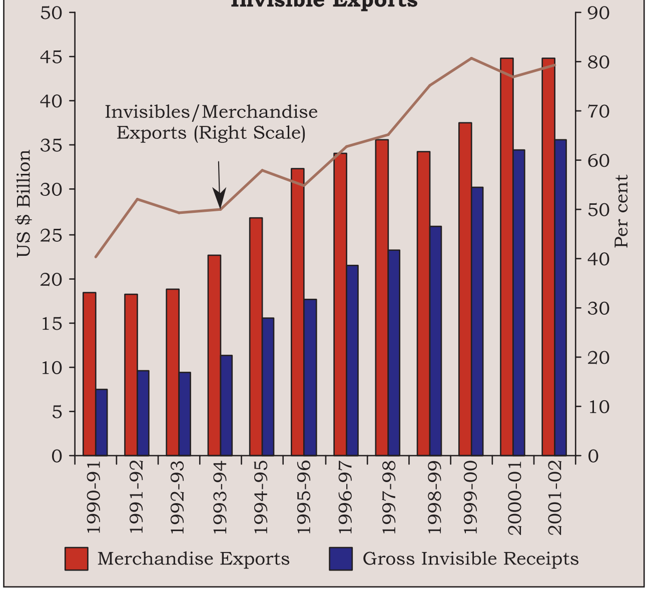
Chart VI.12 : India's Foreign Trade



6.19 Gross invisible receipts rose by 3.4 per cent to US $ 35.6 billion during 2001-02 extending the rising trend that has become entrenched since the 1990s. The growth of invisible receipts has also outpaced that of merchandise exports during the 1990s, indicative of shifts in dynamic comparative advantage (Chart VI.13). India has emerged as among the fastest growing exporters of services in the world (Box VI.1)

6.20 Earnings from export of services comprising mainly travel, transportation, insurance and private business and other miscellaneous services have emerged as the dominant category of invisible receipts since 1998-99, accounting for 57 per cent of the latter in 2001-02. Transfers, mainly private remittances from expatriate Indians, have traditionally been the major source of invisible receipts. In the recent years, however, their share in gross invisible receipts has declined from 53 per cent in 1997-98 to 35 per cent in 2001-02. The

Chart VI.13 : India's Merchandise and Invisible Exports

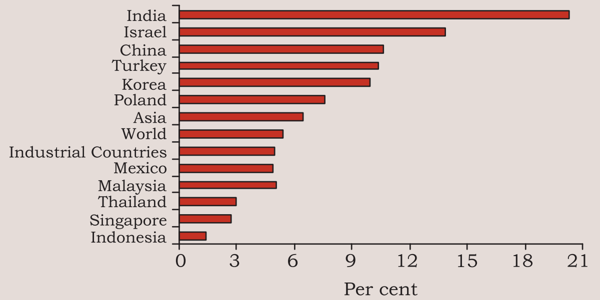


Box VI.1

Role of Invisibles in Balance of Payments: A Cross-Country Survey

A significant degree of support to the Indian balance of payments has been the surplus under invisibles which has grown over time to around US $ 14 billion in the recent period as against a deficit of US $ 0.2 billion in 1990-91.Cross-country comparative analysis* reveals that growth in India's earnings from exports of services (compound growth of 20.3 per cent per annum during 1994-2000) outpaced that recorded by the major exporting countries/regions (Chart A).

Chart A : Growth Rate of Services' Receipts : 1994-2000



The share of services exports of India to total world exports doubled from 0.6 per cent in 1994 to 1.2 per cent in 2000 (Chart B).

A disaggregation of services (travel, transportation and other services) indicates that India's performance has been led by the sub-group 'other services' comprising exports of software and other IT related services *etc.* The share of India's 'other services' in the world exports in the category quadrupled from 0.5 per cent to 2.0 per cent over the period 1994-2000. The proportion of travel and transportation receipts in India's total services' exports has been lower than that of the Asian region and the world (Chart C).

Chart B : Export of Services by India

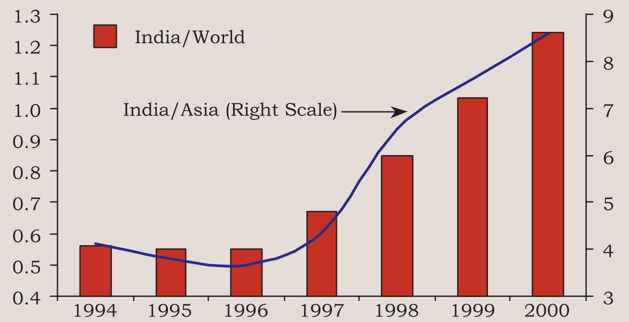
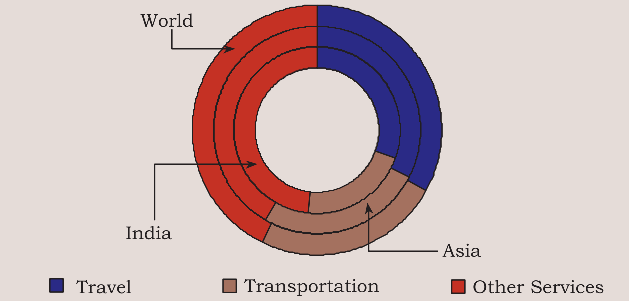


Chart C : Major Sources of Services' Receipts : 1994-2000



* All data for cross-country comparison in this box (including India) are based on the IMF's Balance of Payments Statistics Yearbook (2001).

(Contd....)

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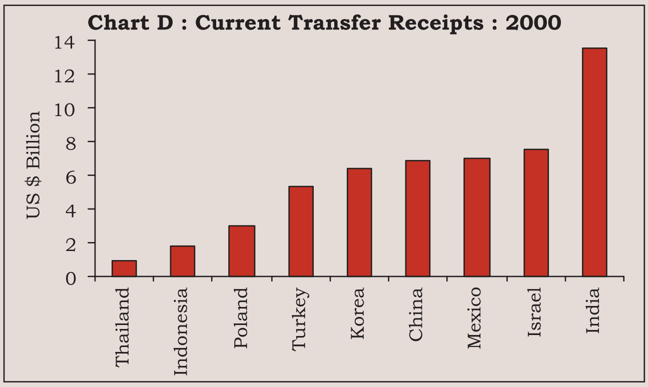
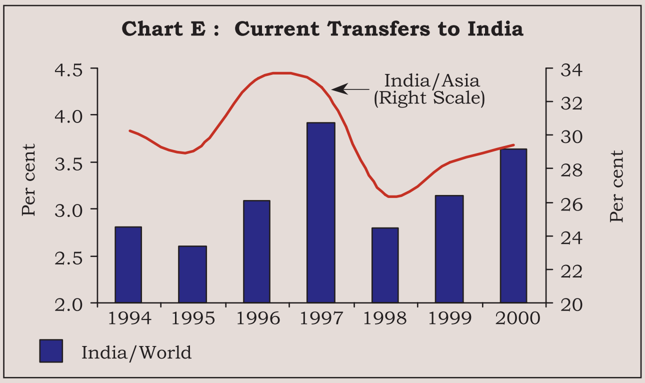
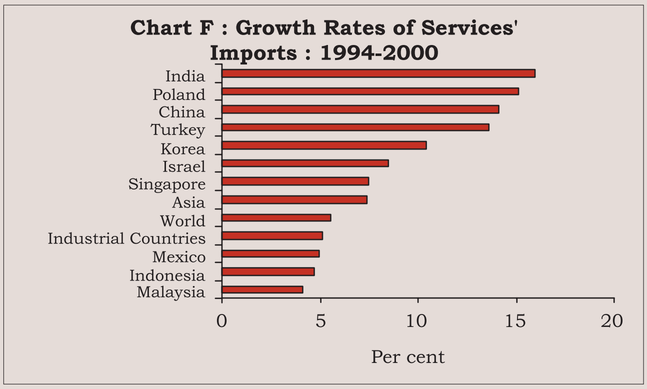
At US $ 13.5 billion during 2000, India's current transfers (almost entirely on account of private remittances) were well ahead of other major developing economies like Israel, Mexico and China (Chart D).



During 2000, India received around 29 per cent of the transfers received by the Asian region (Chart E).

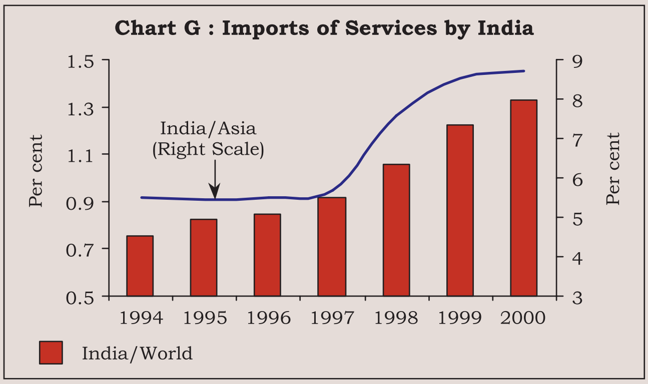


Imports of services by India also increased sharply (by 15.9 per cent per annum over the period 1994-2000) although at a rate lower than that of receipts (Chart F).

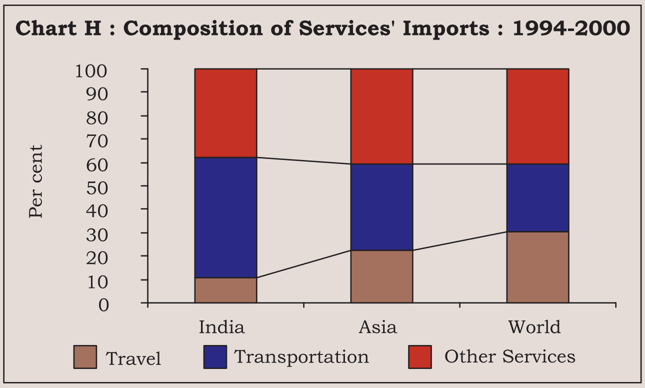


As a result, imports of services by India increased to 1.3 per cent and 8.7 per cent of world and Asian services' imports, respectively, during 2000 (Chart G).

During 1994-2000, India spent only 10.6 per cent of its services outgo on account of travel as compared with 28.7



per cent by all countries taken together. Expenditure on 'other services' at 37.2 per cent of total services was broadly the same as that of the Asian region and all countries. On the other hand, outgo under transportation at 50.5 per cent of total services imports was almost double that of all countries (27.6 per cent) (Chart H). The lower proportion of travel in India could be attributed to relatively low per capita income and relatively lower leisure spending, while the higher share of transport could be reflective of inadequate domestic shipping facilities.



The growing role of trade in services in cross-border trade has received a strong impetus from the revolution in information technology in the 1990s and the increased role of foreign direct investment in service activities like banking and insurance. Notwithstanding the strong growth in services, the barriers to international trade in services, mainly opaque, remain. Gains from liberalisation of services trade would be about US $ 1,181 billion, almost double that would emanate from liberalisation of merchandise goods (US $ 677 billion) (IMF, 2001). Thus, India has the potential to reap even higher benefits from invisible earnings in the future.

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1. Braga, Carlos A.P. (1996), "The Impact of Liberalisation of Services on Developing Countries", *Finance and Development*, Volume 33, No. 1, March.
2. International Monetary Fund (2001), *World Economic Outlook*, October.

Chart VI.14 : Major Sources of Invisible Receipts

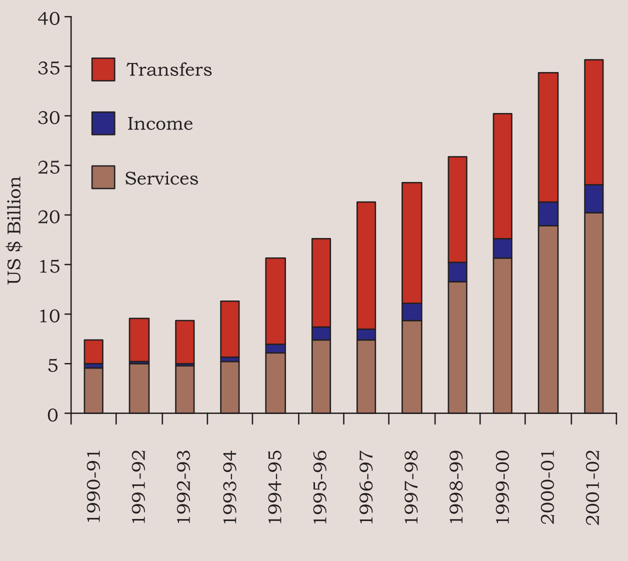
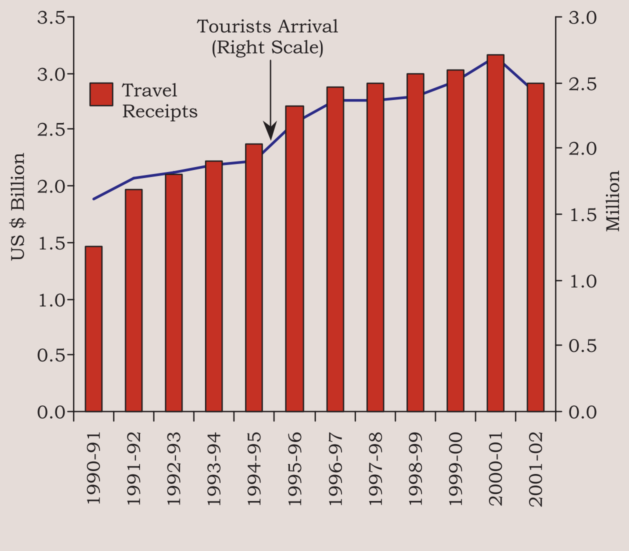


Chart VI.15 : Travel Receipts



share of factor income in gross invisible receipts rose steadily during the 1990s and formed around eight per cent of gross invisible receipts during 2001-02 (Chart VI.14).

6.21 Earnings from tourism recorded under travel receipts are the second largest category under services. In recent years, there has been a stagnation in these earnings on account of the highly uncertain climate for international tourism which was further vitiated by the September 11 incident in 2001-02 and the geo-political situation in the Indian sub-continent. The behaviour of travel receipts mainly reflects the variations in tourist arrivals in the country (Chart VI.15). The composition of tourist arrivals has broadly remained unchanged over the last 4-5 years (Chart VI.16).

6.22 During the late 1990s, miscellaneous services comprising software exports and a host of technology related and business services posted a sharp increase coincident with the massive spurt in software exports, and aided in general by the climate of progressive liberalisation in the economy. By 1997-98, earnings from miscellaneous services had emerged as the second largest constituent of invisible receipts, surpassing travel; in 2001-02, miscellaneous services replaced private transfers as the most important category of invisibles (Chart VI.17). Software exports recorded a growth of 13.1 per cent in 2001-02 on the top of an increase of 57.9 per cent in 2000-01, notwithstanding the marked slowdown witnessed by IT companies globally (Chart VI.18).

Chart VI.16 : Tourist Arrivals : Country-wise

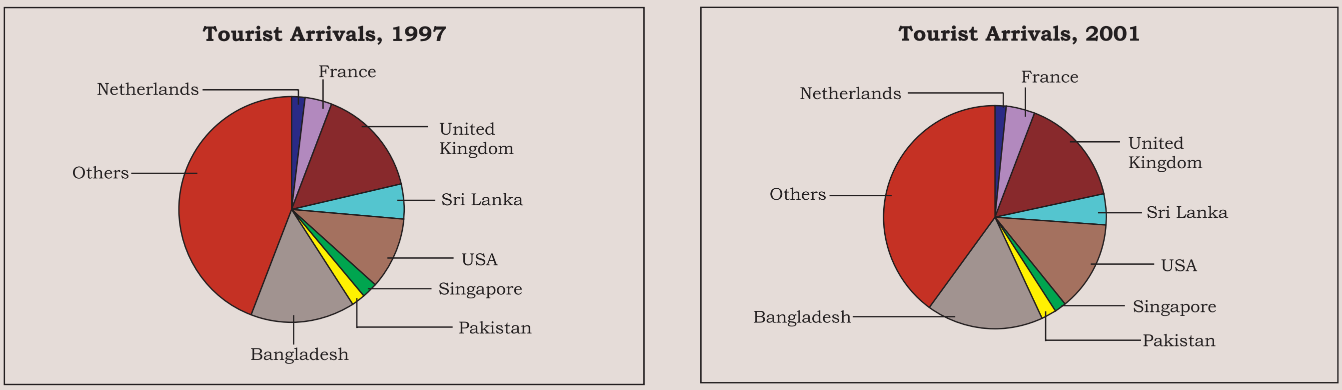
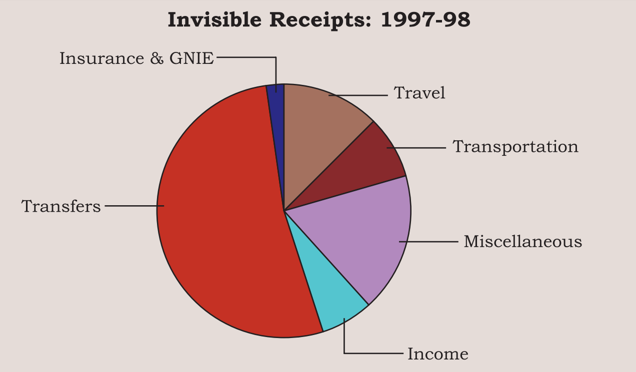
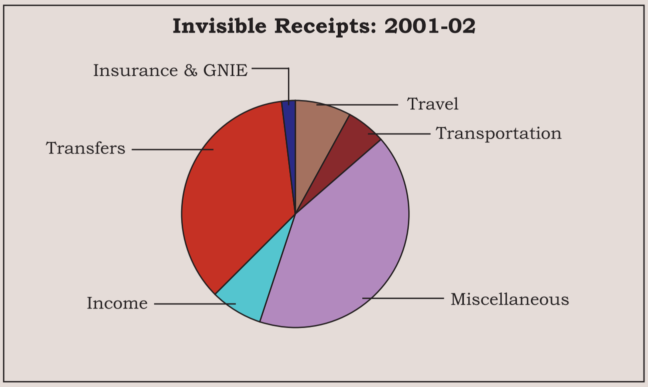


Chart VI.17 : Composition of Invisible Receipts





6.23 Private transfer receipts have been progressively losing their dominant position in gross invisibles in recent years. This has been partly due to the sharp decline in bullion brought into the country as baggage following the liberalisation of gold imports. In 2001-02, private transfer receipts declined to US $ 12.2 billion from US $ 12.9 billion in 2000-01 on account of the decline in inward remittances, the mainstay of this category, reflecting the imponderables characterising the post September 11 period.

6.24 Investment income receipts increased by 17.9 per cent to US $ 2.7 billion during 2001-02 in tandem with the accumulation of foreign exchange reserves and the rising foreign income from the deployment of these assets abroad (Chart VI.19).

6.25 Invisible payments declined by 4.8 per cent in 2001-02 to US $ 21.6 billion as increase in payments under miscellaneous services was more than off-set by decline in payments for other categories of services and investment income payments (Chart VI.20).

6.26 Travel payments, which had been rising steadily in the 1990s consequent upon the liberalisation of current international transactions in 1994, declined by 20.6 per cent to US $ 2.3 billion in 2001-02. The adverse international environment for business and tourism had a dampening effect on Indians travelling overseas and this was reflected in the lower outgoes under travel payments.

6.27 Miscellaneous payments increased by 10.2 per cent to US $ 10.9 billion in 2001-02 mainly on account of financial services, technology related

Chart VI.18 : Earnings from Software Exports

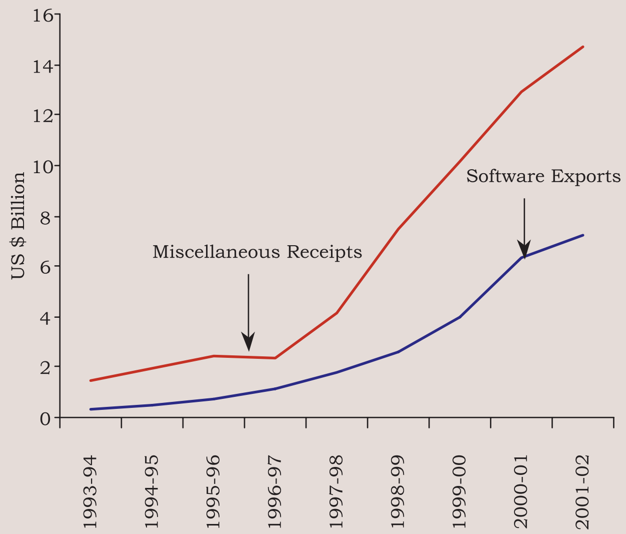


Chart VI.19 : Income Receipts and Foreign Currency Assets

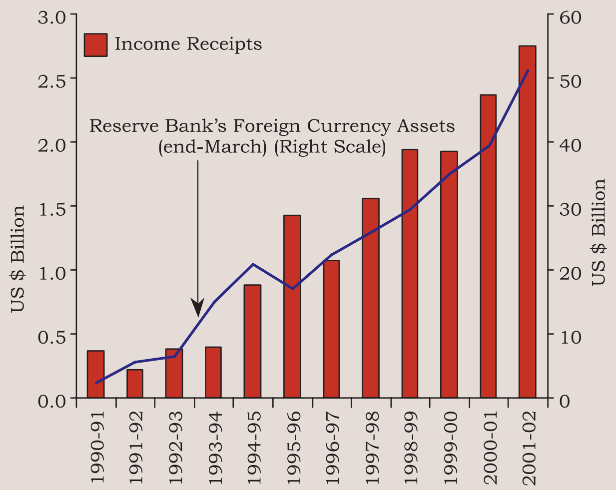
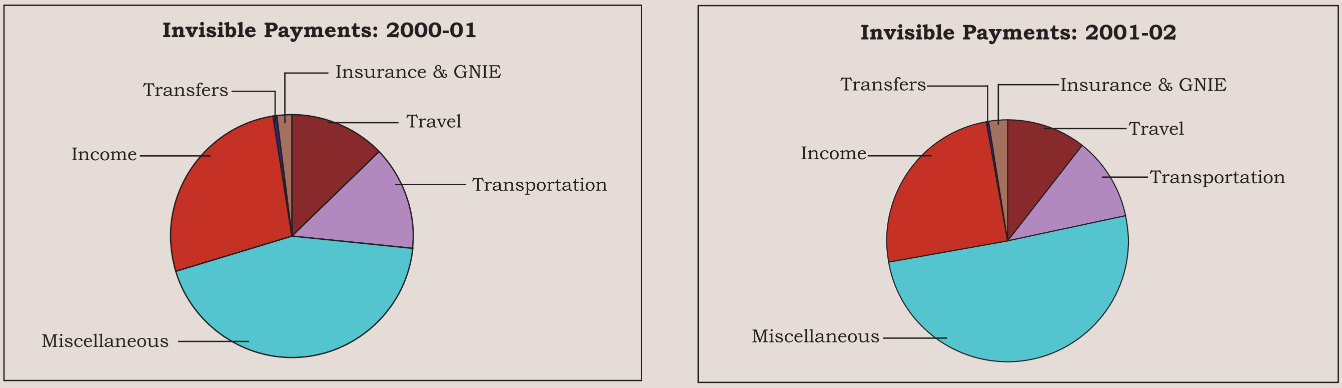


Chart VI.20 : Composition of Invisible Payments



services and the heterogeneous group of other business services.

6.28 Investment income payments, representing the servicing of India's external liabilities, declined by 12.7 per cent to US $ 5.4 billion during 2001-02, mainly due to softening of interest rates in international markets. In general, investment income payments have moved closely with the stock of external liabilities (Chart VI.21).

Current Account

6.29 The current account recorded a surplus of US $ 1.4 billion during 2001-02 as against a deficit of US $ 2.6 billion during the previous year; the turnaround was due to a contraction in net payments on the merchandise account as well as a higher invisible surplus (Chart VI.22). As a proportion to GDP, the current account surplus was 0.3 per cent during 2001-02 as against a deficit of 0.5 per cent during 2000-01 and the average deficit of 1.3 per cent over the 1990s.

Capital Account

6.30 The balance of payments outturn for 2001-02 was dominated by stronger capital flows than in the preceding year despite the uncertainty surrounding international financial markets. Net capital flows were higher at US $ 9.5 billion during 2001-02 than that of US $ 9.0 billion during 2000-01 led by foreign direct investment (FDI) flows and non-resident deposits (Chart VI.23 and Appendix Table VI.2).

Chart VI.21 : Income Payments

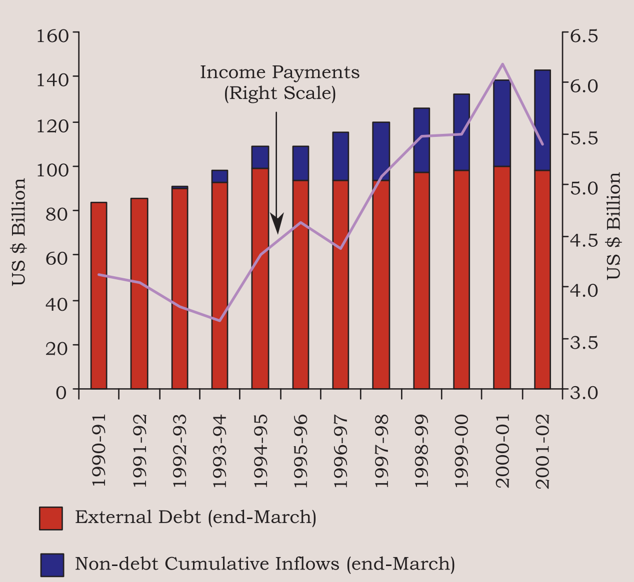


Chart VI.22 : India's Current Account Balance

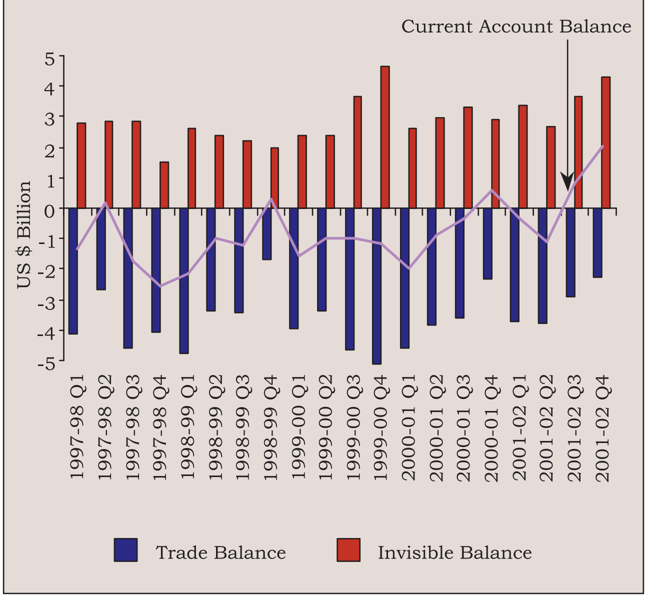
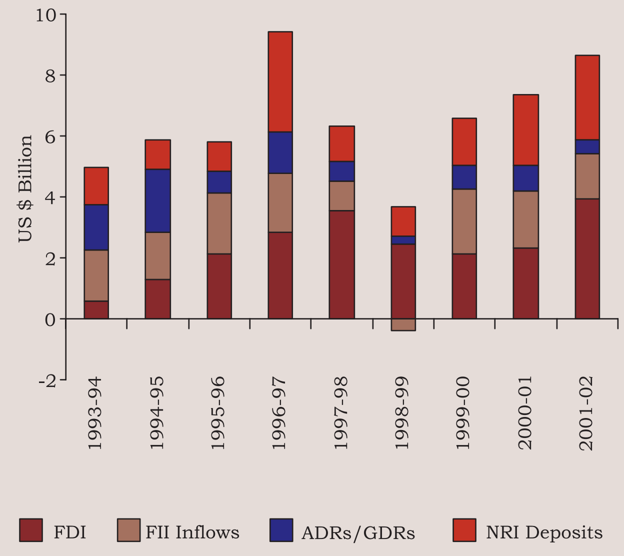


Chart VI.23 : Capital Flows

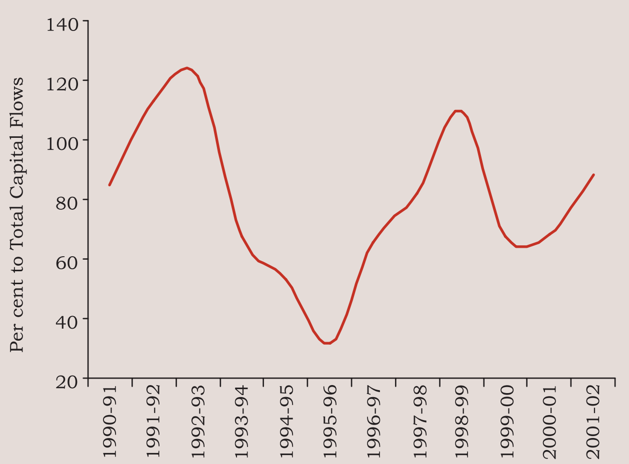


6.31 It is noteworthy that the proportion of stable flows (*i.e.,* all capital flows excluding portfolio flows and short-term trade credit) to total capital flows increased sharply to 88.1 per cent during 2001-02 from 68.2 per cent during 2000-01 (Chart VI.24 and Appendix Table VI.7).

Foreign Investment

6.32 Foreign investment flows rose to US $ 5.9 billion in 2001-02 demonstrative of growing global investors' confidence in the Indian economy. Inflows under FDI touched a high of US $ 3.9 billion during 2001-02 surpassing the previous peak of US $ 3.6 billion achieved in 1997-98. On the other hand, there was a reduction in portfolio investment flows from US $ 2.8 billion during 2000-01 to US $ 2.0 billion during 2001-02 as both foreign institutional investment (FII) inflows and amounts raised through the GDR/ADR route were lower than in the previous year (Table 6.2).

Chart VI.24 : Stable Capital Flows



Note : Stable flows represent all capital flows excluding portfolio flows and short term credit.

Table 6.2 : Foreign Investment Flows by Category

(US $ million)

Item	2001-02 (P)	2000-01	1999-00
1	2	3	4
A . Direct Investment	**3,904**	**2,339**	**2,155**
a) Government (SIA/FIPB)	2,221	1,456	1,410
b) RBI	767	454	171
c) NRI	35	67	84
d) Acquisition of shares *	881	362	490
B. Portfolio Investment	**2,021**	**2,760**	**3,026**
a) GDRs/ADRs #	477	831	768
b) FIIs @	1,505	1,847	2,135
c) Off-shore funds and others	39	82	123
Total (A+B)	**5,925**	**5,099**	**5,181**

P Provisional.

* Relates to acquisition of shares of Indian companies by non-residents under Section 5 of FEMA, 1999.

Represents the amount raised by Indian corporates through Global Depository Receipts (GDRs) and American Depository Receipts (ADRs).

@ Represents net inflow of funds by FIIs.

Note: Data on foreign investment presented here represent gross inflows into the country and may not tally with the data presented in other tables which include direct imports against foreign investment, Indian investment abroad as well as disinvestments. They also differ from data relating to net investment in stock exchanges by FIIs in Section V.

6.33 The source and direction of FDI flows remained, by and large, unchanged during the 1990s. Companies registered in Mauritius and the US were the principal sources of FDI in India during 2001-02 (Table 6.3).

6.34 The bulk of FDI was channelled into services, electronics and electrical equipment, computers (hardware and software) and engineering industries (Table 6.4).

Table 6.3 : Foreign Direct Investment - Country-wise Inflows*

(US $ million)

	2001-02 P	2000-01	1999-2000
1	2	3	4
Germany	74	113	31
Italy	28	29	125
Japan	143	156	142
Mauritius	1,863	843	501
Netherlands	68	76	82
South Korea	3	24	8
USA	364	320	355
Others	445	349	337
Total	**2,988**	**1,910**	**1,581**

P Provisional.

* Exclude inflows under the NRI direct investment route through the Reserve Bank and inflows due to acquisition of shares.

Table 6.4 : Foreign Direct Investment - Industry-wise Inflows*

(US $ million)

Sectors	2001-02 P	2000-01	1999-2000
1	2	3	4
Chemical and allied products	67	137	120
Computers	368	306	99
Engineering	231	273	326
Electronics and Electrical equipment	659	213	172
Finance	22	40	20
Food and Dairy Products	49	75	121
Pharmaceuticals	69	62	54
Services	1,128	226	116
Others	396	578	553
Total	**2,988**	**1,910**	**1,581**

P Provisional.

* Exclude inflows under the NRI direct investment route through the Reserve Bank and inflows due to acquisition of shares.

Non-Resident Deposits

6.35 Net accretions under various NRI deposit schemes were higher in 2001-02 than in the previous year, entirely on account of accretions under the NR(E)RA scheme. Deposits under other schemes (FCNR(B) and NR(NR)RD) were, however, lower than that in the previous year (Table 6.5 and Chart VI.25).

External Commercial Borrowings

6.36 The demand for external commercial borrowings (ECBs) continued to remain constrained by the weakness in domestic investment demand. Disbursements under ECBs were US $ 3.1 billion in

Table 6.5 : NRI Deposit Schemes

(US $ million)

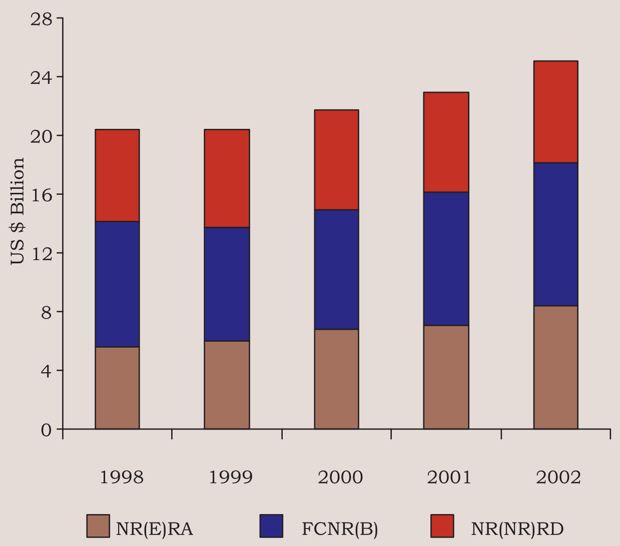
Scheme	Outstanding (End-March) 2002(P)	2001	Variation @ 2001-02(P)	2000-01
1	2	3	4	5
1. FCNR(B)	9,670	9,076	594	904
2. NR(E)RA	8,432	7,147	1,626	860
3. NR(NR)RD	7,049	6,849	508	553
Total	**25,151**	**23,072**	**2,728**	**2,317**

P Provisional

@ All figures are inclusive of accrued interest and valuation changes arising on account of fluctuations in non-dollar currencies against the US dollar.

Note: Variations do not match with the differences between the outstanding stocks for rupee deposits on account of exchange rate fluctuations during the year.

Chart VI.25 : Outstanding Non-Resident Deposits

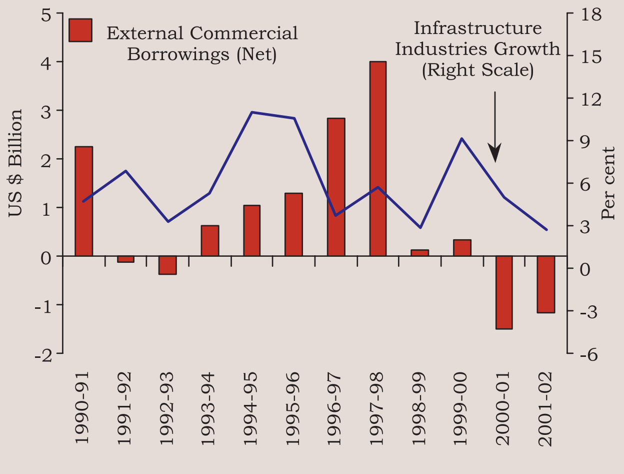


2001-02 as compared with US $ 3.8 billion (excluding India Millennium Deposits (IMDs) of US $ 5.5 billion) in 2000-01 (Chart VI.26). Amortisation payments declined to US $ 4.3 billion from US $ 5.3 billion as the preceding year was marked by a large recourse to pre-payments/refinancing. Accordingly, there were net outflows under ECBs of US $ 1.1 billion during 2001-02 as compared with US $ 1.5 billion (excluding IMDs) during 2000-01.

External Assistance

6.37 Net inflows under external assistance (loans *plus* grants *less* repayments and interest payments) were US $ 0.4 billion during 2001-02 as compared with a net outflow of US $ 0.6 billion during the

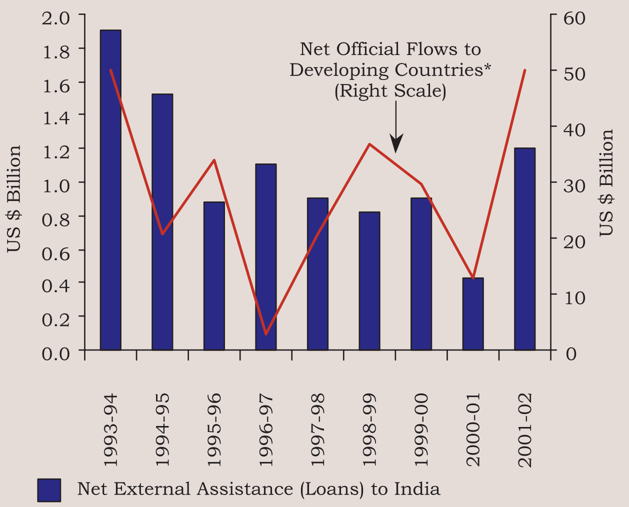
Chart VI.26 : Inflows under External Commercial Borrowings



Note: External commercial borrowings in this chart exclude IDBs, RIBs and IMDs.

preceding year due to higher disbursements and lower amortisation. Amortisation payments declined from US $ 2.6 billion during 2000-01 to US $ 2.2 billion during 2001-02 as the preceding year included pre-payments. Gross utilisation (loans *plus* grants) at US $ 3.7 billion during 2001-02 was higher than that of US $ 3.1 billion during the previous year (Appendix Table VI.8). In recent years, flows under external assistance (loans) have waned in importance given the policy efforts to attract non-debt creating flows as also the general sluggishness in overall official flows to developing economies (Chart VI.27).

Chart VI.27 : External Assistance (Loans) Flows

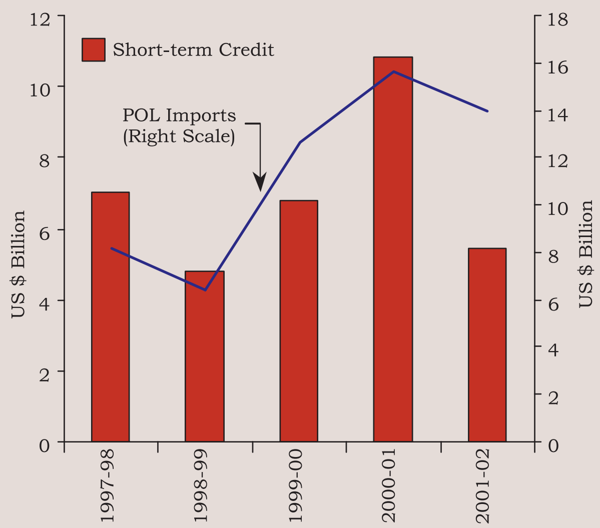


* Source: WEO, IMF (2002).

Short-term Credits

6.38 Disbursements under short-term credits almost halved, mainly in consonance with the decline in oil imports, from US $ 10.8 billion during 2000-01 to US $ 5.5 billion during 2001-02 (Chart VI.28). Amortisation payments fell in tandem and net flows under short-term credits turned negative (US $ 0.9 billion) during 2001-02 as against an inflow of US $ 0.1 billion during 2000-01.

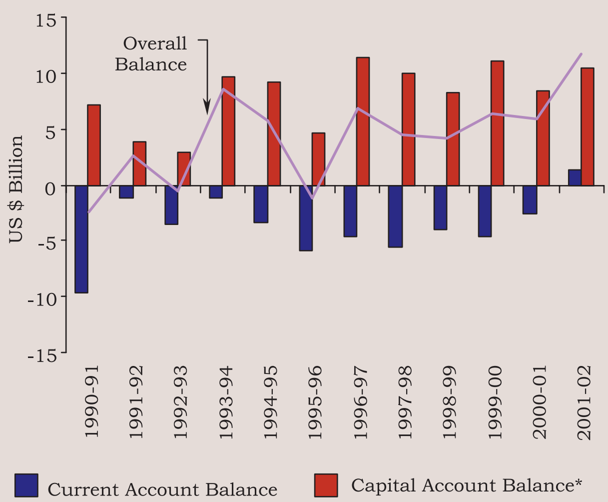
Chart VI.28 : Short-term Credit



Overall Balance

6.39 The overall balance recorded a surplus of US $ 11.8 billion during 2001-02 as compared with that of US $ 5.9 billion in 2000-01 (Chart VI.29).

Chart VI.29 : Overall Balance of Payments



* Inclusive of Errors and Omissions.

Table 6.6 : Foreign Exchange Reserves

(US $ Million)

Year	Gold	SDRs	Foreign Currency Assets	Foreign Exchange Reserves	Reserve Position In Fund	Outstanding use of IMF Credit
1	2	3	4	5 (2+3+4)	6	7
March 1993	3,380	18	6,434	9,832	296	4,799 (3,433)
March 1994	4,078	108	15,068	19,254	299	5,040 (3,568)
March 1995	4,370	7	20,809	25,186	331	4,300 (2,755)
March 1996	4,561	82	17,044	21,687	310	2,374 (1,625)
March 1997	4,054	2	22,367	26,423	291	1,313 (947)
March 1998	3,391	1	25,975	29,367	283	664 (497)
March 1999	2,960	8	29,522	32,490	663	287 (212)
March 2000	2,974	4	35,058	38,036	658	26 (19)
March 2001	2,725	2	39,554	42,281	616	0
March 2002	3,047	10	51,049	54,106	610	0
June 2002	3,330	10	54,703	58,043	651	0

Note: Figures in brackets are in SDR Million.

FOREIGN EXCHANGE RESERVES

6.40 India's foreign exchange reserves, comprising foreign currency assets, gold held by the Reserve Bank and Special Drawing Rights (SDRs) held by the Government increased from US $ 42.3 billion as at end-March 2001 to US $ 54.1 billion as at end-March 2002. The accumulation of US $ 11.8 billion during the year 2001-02 (US $ 4.2 billion during 2000-01) has been the highest accretion in a single year so far (Table 6.6 and Appendix Table VI.9). With the current level of reserves, India is among the top reserve holding emerging market countries (Chart VI.30).

6.41 The foreign currency assets of the Reserve Bank, the predominant component of reserves, increased by US $ 11.5 billion during 2001-02, with a large part of the increase occurring in the period since November 2001. The foreign currency assets increased by US $ 3.0 billion during the first five months of 2001-02 but declined by US $ 0.6 billion during September 2001 on account of outflow of funds under FIIs in the aftermath of September 11 developments. The situation stabilised quickly and the foreign currency assets increased by US $ 9.1 billion during the last six months of 2001-02 (Chart VI.31).

Chart VI.30 : Total Reserves Excluding Gold

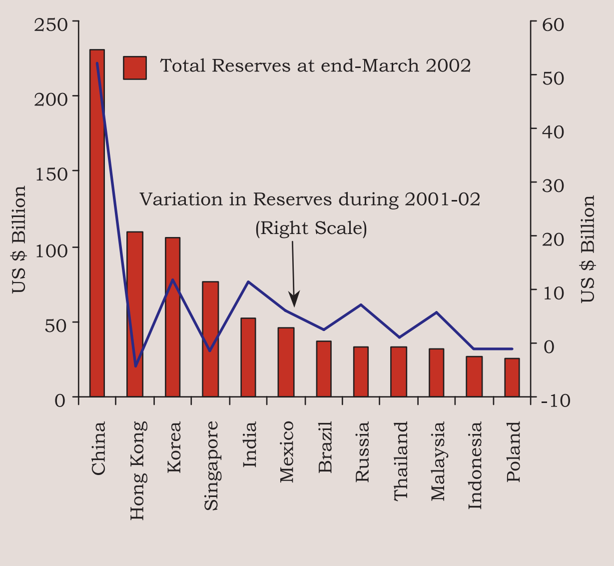
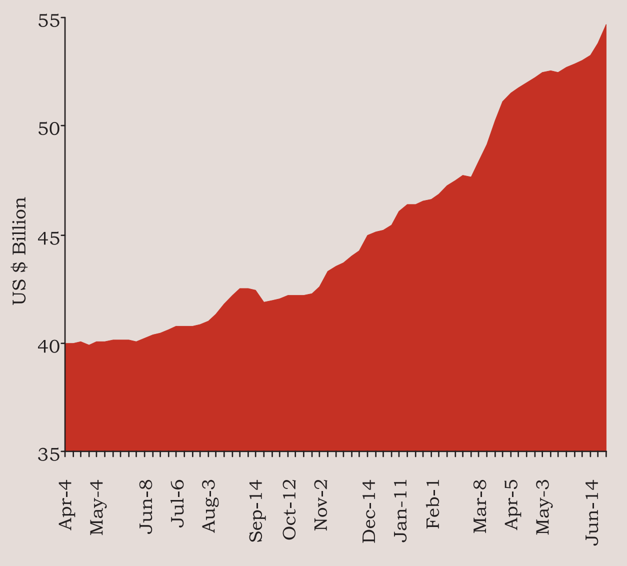


Chart VI.31 : Movements in Foreign Currency Assets



6.42 The value of gold holdings of the Reserve Bank increased by US $ 0.3 billion from US $ 2.7 billion as at end-March 2001 to US $ 3.0 billion as at end-March 2002. The level of SDRs held by the Government increased by US $ 8 million during the year to US $ 10 million as at end-March 2002.

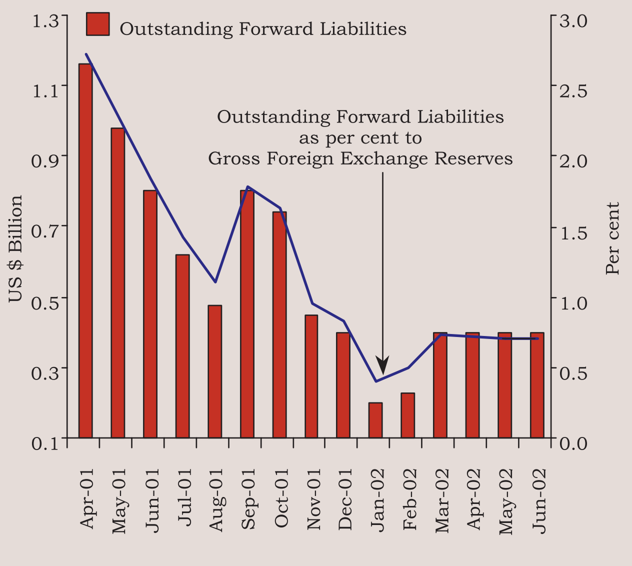
6.43 The outstanding forward liabilities of the Reserve Bank, which have been maintained at relatively low levels as a part of prudent reserve management policy, declined even further during the year from US $ 1.3 billion as at end-March 2001 to US $ 0.4 billion as at end-March 2002. As a result, the ratio of outstanding forward liabilities to gross foreign exchange reserves declined sharply from 3.0 per cent as at end-March 2001 to only 0.7 per cent as at end-March 2002 (Chart VI.32).

6.44 During 2002-03 so far (up to August 16, 2002), the foreign exchange reserves increased by US $ 6.5 billion to US $ 60.6 billion as foreign currency assets increased by US $ 6.4 billion to US $ 57.4 billion. The value of gold holdings also recorded an increase of US $ 0.2 billion to US $ 3.2 billion over the same period. The outstanding forward liabilities were US $ 0.4 billion at end-June 2002, the same level as at end-March 2002.

Indicators of Reserve Adequacy

6.45 India's sustained efforts to build an adequate level of foreign exchange reserves have been vindicated by global uncertainties. It is now widely agreed that in judging the adequacy of reserves in emerging economies, it is not enough to relate the size of reserves to the quantum of merchandise imports or the size of the current account deficit. The overall approach to the management of India's foreign exchange reserves in recent years has, therefore, reflected the changing composition of balance of payments. In addition to the likely developments in the current account, the reserve management has also endeavoured to reflect the risks associated with different types of flows and other requirements. A sufficiently high level of reserves is necessary to ensure that even if there is prolonged uncertainty, reserves can cover the "liquidity at risk" on all accounts over a fairly long period.

Chart VI.32 : Reserve Bank's Forward Liabilities

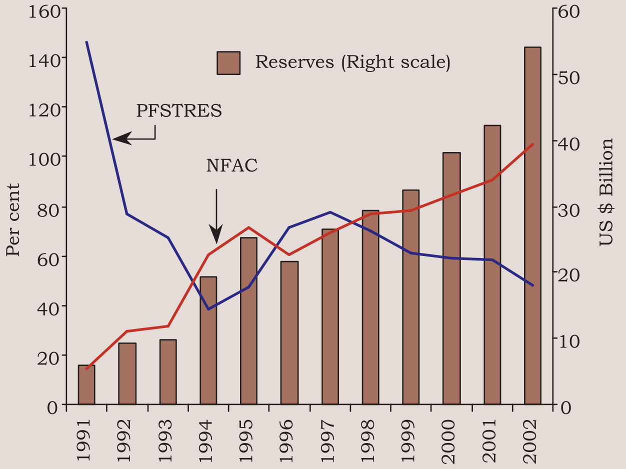


6.46 The movement in foreign exchange reserves in recent years has kept pace with India's external financing requirements on current and capital accounts. The policy for reserve management is built upon a host of identifiable factors and other contingencies which, *inter alia*, include: the size of the current account deficit; the size of short-term liabilities (including current repayment obligations on long-term loans); the possible variability in portfolio investment and other types of capital flows; the unanticipated pressures on the balance of payments arising out of external shocks (such as the impact of the East Asian crisis in 1997-98 or increase in oil prices in 1999-2000 or recent events in the US); and, movements in the repatriable foreign currency deposits of non-resident Indians. Leaving aside short-term variations in reserve levels, the policy objective is that quantum of reserves in the long-run should be in line with the growth of the economy and the size of risk-adjusted capital flows.

6.47 In this context, a 'liquidity at risk' rule has also been suggested that would take into account the foreseeable risks that a country could face. Accordingly, a country's liquidity position could be calculated under a range of possible outcomes for relevant financial variables (exchange rates, commodity prices, credit spreads *etc.*). While the concept of liquidity at risk has been broadly discussed at different forum, no specific methodology has been outlined. It has been left to the institutions and countries to develop their own approaches.

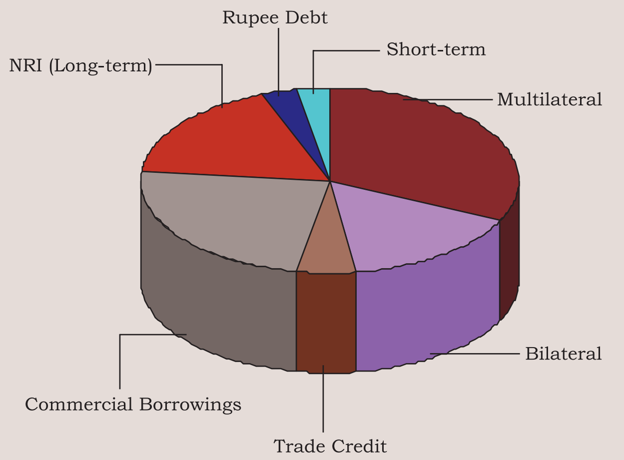
6.48 These considerations have necessitated a constant monitoring of the adequacy of international reserves. The traditional trade based indicator of reserve adequacy *i.e.,* the import cover of reserves, which fell to a low of 3 weeks of imports at end-December 1990, has improved to 11.3 months of imports as at end-March 2002. In terms of the

Chart VI.33 : Foreign Exchange Reserves and Adequacy Indicators



Note: PFSTRES refers to the ratio of cumulative portfolio flows and short-term debt to foreign exchange reserves.
NFAC refers to the ratio of net foreign exchange assets of the Reserve Bank to currency in circulation.

Chart VI.34 : Composition of India's External Debt (end-March 2002)



money-based indicators, the ratio of net foreign exchange assets of the Reserve Bank to currency in circulation has sharply increased from 14.4 per cent at end-March 1991 to 105.2 per cent at end-March 2002 while that of net foreign exchange assets to broad money has increased from 3.0 per cent to 17.6 per cent over the same period. The debt-based indicators of reserve adequacy have also steadily improved in the 1990s. The ratio of volatile capital flows (defined as cumulative portfolio flows and short-term debt), which was 71.1 per cent of reserves as at end-March 1996 fell to 48.1 per cent as at end-March 2002 (Chart VI.33). Based on these indicators, the current level of foreign exchange reserves can be considered as comfortable.

EXTERNAL DEBT

6.49 India's external debt declined by US $ 1.5 billion (1.5 per cent) during 2001-02 to US $ 98.1 billion at end-March 2002 from US $ 99.6 billion at end-March 2001. Almost one-half of India's external debt was owed to multilateral and bilateral agencies, while around one-fourth was on account of external commercial borrowings (Chart VI.34). All components of external debt, except multilateral debt and long-term non-resident deposits, declined during 2001-02.

6.50 Key indicators of debt sustainability suggest continuing consolidation and improvement in solvency (Box VI.2). The external debt-GDP ratio

Box VI.2
External Debt Management

India's external debt management over the last decade has led to India being classified as a 'less indebted country' by the World Bank. The multi-pronged strategy to impart sustainability to the external debt has been:

- Promotion of exports and other current receipts to contain current account deficit within sustainable limits;
- Measures to encourage non-debt creating capital flows;
- Annual cap, minimum maturity restrictions and prioritising the use of ECBs subject to an approval process. The approval process has been gradually relaxed over time and, at present, involves a dual route - an automatic route for borrowings up to a ceiling (US $ 50 million) and a prior approval system for borrowings above the ceiling;
- Keeping longer-term ECBs outside the annual cap to elongate the maturity profile;
- LIBOR-linked ceilings on interest rates and minimum maturity requirements on foreign currency denominated NRI deposits to attract stable deposits and avoid build-up of short-term debt;
- Reduction of short-term debt together with controls to prevent its undue increase in future;
- Retiring and refinancing of more expensive external debt;
- A market-determined exchange rate policy to avoid undue borrowings in foreign currency;
- Conscious build-up of foreign exchange reserves to provide insurance against external sector uncertainties.

In regard to transparency and disclosure norms, the external debt statistics of India are acknowledged to be among the best in terms of coverage, timeliness, comprehensiveness and transparency. There is a strong institutional mechanism for measurement of external debt and effective monitoring

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of the external sector including a set of credible and relevant leading indicators of external vulnerability like external debt GDP ratio, debt-service ratio, stock of short-term debt by original as well as residual maturity and in relation to foreign exchange reserves. Although contingent liabilities are not a part of external debt, these are also monitored. The Indian approach recognises the need for constantly upgrading statistics and reporting systems so that appropriate policy responses can be initiated and information demands can be met. Accordingly, various Study Groups have been undertaking in-depth studies on issues relating to these areas.

Reflecting the policy efforts, India's external debt sustainability indicators have undergone a significant improvement during the 1990s. In terms of absolute level of debt, India's position has improved from third largest debtor after Brazil and Mexico in 1991 to tenth position in 2001 after Brazil, Russia, Mexico, China, Indonesia, Argentina, Korea, Turkey, and Thailand. The external debt ratio has declined form 38.7 per cent at end-March 1992 to 20.8 per cent at end-March 2002 while the ratio of short-term debt to total has declined form 10.3 per cent to 2.8 per cent over the same period. Total debt service ratio has more than halved from 35.3 per cent during 1990-91 to 14.1 percent during 2001-02. Debt-current receipts ratio has come down from 328.9 per cent at end-March 1991 to 122.5 per cent at end-March 2002. In terms of composition of debt, about 36 per cent of India's external debt comprises concessional debt which is high in comparison to international standards.

declined from 22.3 per cent as at end-March 2001 to 20.8 per cent as at end-March 2002. The concessional debt, as a proportion to total debt, at 35.8 per cent as at end-March 2002 was almost unchanged from 36.0 per cent as at end-March 2001. The size of short-term debt remained modest both in regard to total debt and reserves. While the proportion of short-term to total debt declined to 2.8 per cent at end-March 2002 from 3.5 per cent at end-March 2001, the ratio of short-term debt to foreign exchange reserves declined to 5.1 per cent from 8.2 per cent over the same period (Table 6.7). The ratio of debt to current receipts too declined to 122.5 per cent at end-March 2002 from 126.1 per cent at end-March 2001.

6.51 The debt service ratio and the liability service ratio, which had increased in 2000-01 due to pre-payments, declined during 2001-02 to 14.1 per cent and 15.3 per cent from 17.3 per cent and 18.3 per cent, respectively. This reflected, in significant measure, the rising trend in current external receipts (Table 6.8 and Chart VI.35).

EXCHANGE RATE DEVELOPMENTS

6.52 The exchange rate of the Indian rupee *vis-à-vis* the US dollar moved within a range of Rs.46.56-Rs. 48.85 per US dollar during 2001-02. On the basis of monthly averages, the exchange rate depreciated by 4.3 per cent from Rs.46.62 per US dollar in March 2001 to Rs.48.74 per US dollar in March 2002. It remained broadly stable against the other major international currencies during April-August 2001. Reflecting the nervous sentiments ruling financial markets in the wake of the September 11 events, the rupee depreciated against the US dollar, the Euro, the Pound Sterling and the Japanese Yen by 1.1 per cent, 2.4 per cent, 2.9 per cent and 3.5 per cent, respectively, between August and September 2001. Subsequently, the rupee recovered and appreciated against the Euro, the Pound Sterling and the Japanese

Table 6.7 : Important Indicators of External Debt *(as at end-March)*

(Per cent)

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002
1	2	3	4	5	6	7	8	9	10	11	12	13
Short-term debt (original maturity) to foreign exchange reserves	146.5	76.7	64.5	18.8	16.9	23.2	25.5	17.2	13.2	10.3	8.2	5.1
Short-term debt (original maturity) to foreign currency assets	382.1	125.6	98.5	24.1	20.5	29.5	30.1	19.4	14.5	11.2	8.8	5.4
Non-debt liabilities and short-term debt to reserves	148.2	79.2	72.6	44.5	57.0	92.3	105.4	107.4	102.1	99.9	100.8	88.4
Short-term debt and non-debt reversible liabilities to reserves	146.6	76.8	67.1	38.7	47.3	71.1	77.3	70.1	60.8	59.0	58.5	48.1
Debt to current receipts	328.9	312.3	323.4	275.6	235.8	188.9	169.6	159.8	162.1	145.6	126.1	122.5
Interest payments to current receipts	15.5	13.0	12.5	10.5	9.7	8.8	7.3	7.5	7.8	7.3	6.6	5.4

Table 6.8 : External Debt Service Payments

(US $ million)

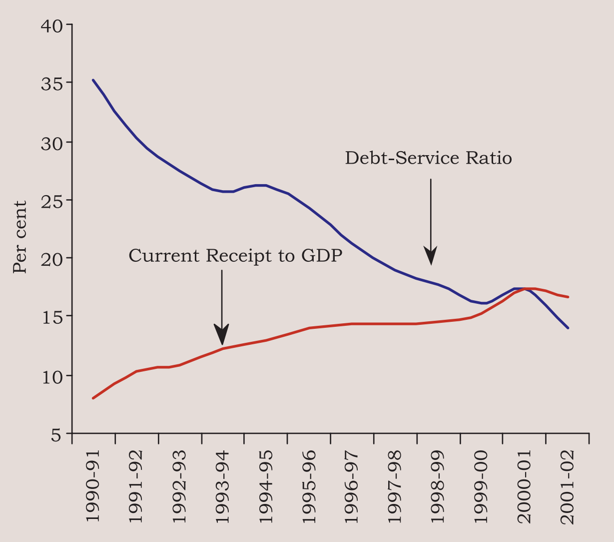
Item	2001-02	2000-01	1999-00
1	2	3	4
1. External Assistance @	3,240	3,706	3,438
2. External Commercial Borrowing *	5,997	7,665	4,758
3. IMF #	0	26	267
4. NRI Deposits (Interest Payments)	1,555	1,659	1,742
5. Rupee Debt Service	519	617	711
6. Total Debt Servicing	11,311	13,673	10,916
7. Total Current Receipts **	80,142	79,003	67,472
8. Debt Service Ratio (6/7) (per cent)	14.1	17.3	16.2
9. Interest Payments to Current Receipts Ratio (per cent)	5.4	6.6	7.3
10. Debt to Current Receipts Ratio (per cent)	122.5	126.1	145.6
11. Liability Service Ratio (per cent)	15.3	18.3	17.0

@ Inclusive of non-Government account.
* Inclusive of interest on medium, long-term and short-term credits.
\# Excluding charges on net cumulative allocation.
** Excluding Official Transfers.

Note: 1. Debt service payments in this table follow accrual method of accounting consistent with balance of payments and may, therefore, vary from those recorded on cash basis.

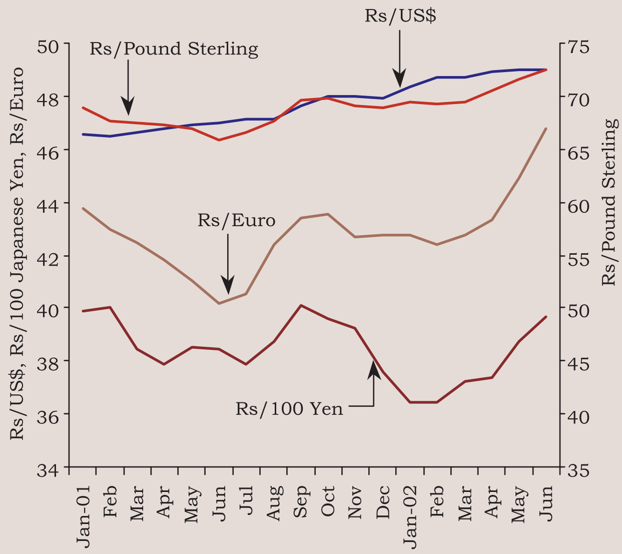
2 Liability-service ratio represents debt service payments and remittances of profits and dividends taken together as a ratio of total current receipts.

Chart VI.35 : Debt Service Ratio



Yen by 1.5 per cent, 0.5 per cent and 7.8 per cent, respectively, between September 2001 and March 2002 (Chart VI.36).

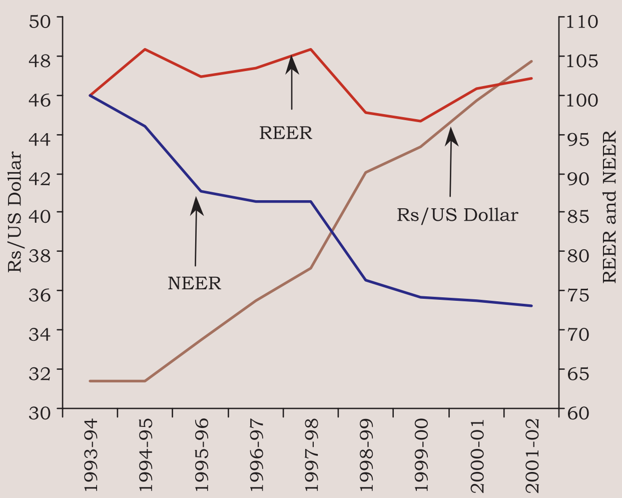
Chart VI.36 : Indian Rupee *vis-a-vis* Major Currencies



6.53 The phases in the movement of the rupee against the major international currencies are reflected in the behaviour of the nominal effective exchange rate (NEER). The real effective exchange rate (REER) was broadly stable during the year (Chart VI.37).

6.54 In the swap segment, the forward premia for all the three maturities (one-month, three-month and the six-month) hovered around 4 per cent during the first five months (April-August) of 2001-02. In the days following September 11, the premia hardened to 5.5-5.6 per cent across all maturities and increased further to 6.3-6.4 per cent in December 2001. The

Chart VI.37 : Exchange Rate of the Rupee and 5-Country REER and NEER

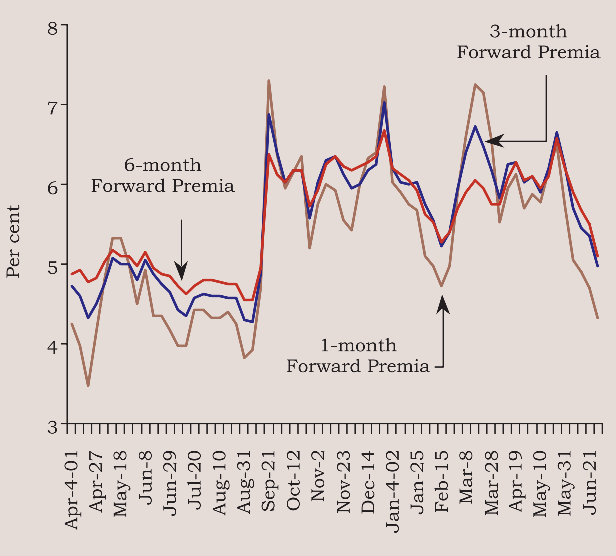


REER: Real Effective Exchange Rate
NEER: Nominal Effective Exchange Rate

forward premia averaged between 5.9-6.9 per cent during March 2002 (Chart VI.38).

6.55 The Indian rupee remained broadly stable during the first four months of 2002-03 except for a brief period of uncertainty in May 2002. The rupee moved in a range of Rs.48.67-49.06 per US dollar during April-July 2002. The exchange rate was Rs.48.58 per US dollar as on August 16, 2002. The six-month forward premia moved in a range of 5.1-6.6 per cent during April-June 2002. Average six-month premia increased to 6.2 per cent in May 2002 before declining to 4.6 per cent in July 2002.

Char VI.38 : Forward Premia



6.56 Recent international developments have underscored the need for careful monitoring of the exchange rate in order to maintain orderly conditions in the markets (without, however, targeting a specific level). India's exchange rate policy of focusing on managing volatility with no fixed rate target, while allowing the underlying demand and supply conditions to determine the exchange rate movements over a period in an orderly way, has stood the test of time. Despite several unexpected external and domestic developments, India's external situation continues to remain highly satisfactory. The Reserve Bank will continue to follow the same approach of watchfulness, caution and flexibility while dealing with the foreign exchange market. It is a matter of satisfaction that the recent international research on viable exchange rate strategies in emerging markets has lent considerable support to the exchange rate policy followed by India. A number of countries (including those in East Asia) are now following similar policies.