II - The real Economy

Macroeconomic Scene Agriculture Industry Services

MACROECONOMIC SCENE

2.1 India's real GDP growth is estimated at 5.2 per cent in 2000-01 as against 6.4 per cent in 1999-2000 and 6.6 per cent in 1998-99. Compared with other developing countries, excluding China, as well as industrial countries, India's growth performance, despite the deceleration, has been quite favourable (Chart II.1). The gross domestic saving rate improved moderately to 22.3 per cent in 1999-2000 from 22.0 per cent in 1998-99. The gross domestic investment rate mirrored the improvement in the saving rate. The net inflow of resources from abroad was 1.0 per cent of GDP as in the preceding year. On the supply side, real GDP growth emanating from agriculture and allied activities recorded a deceleration to 0.2 per cent in 2000-01 from 0.7 per cent during the previous year. Agricultural production, in terms of the index of agricultural production, in fact, declined by 6.5 per cent in 2000-01. Real GDP growth originating from industry slowed down to 5.3 per cent from the preceding year's level of 6.1 per cent. Industrial production, measured in terms of the index of industrial production (IIP), also decelerated to 5.1 per cent during 2000-01 from 6.7 per cent in 1999-2000 on account of pronounced slowdown in manufacturing and electricity. Although GDP growth in the services sector slackened during the year by almost 2 percentage points to 7.5 per cent, it remained close to the average of 8.5 per cent for the period 1994-2000 (Appendix Table II.1).



2.2 The deceleration in real GDP growth during the past two years has engaged policy attention. Filtering the data on real GDP growth to eliminate irregular year-to-year fluctuations indicates the presence of a growth cycle in the Indian economy and a discernible downturn in the second half of the 1990s. Although the economy is currently poised above the long-term average growth rate of 4.4 per cent covering the full period of the growth cycle, there is clearly a need to arrest the downswing and revive the momentum of growth achieved in the high growth phase of

1994-97 (<u>Chart II.2</u>).

2.3 Quarterly real GDP growth moved up marginally to 6.1 per cent in the first quarter of 2000-01 from 6.0 per cent in the fourth quarter of 1999-2000. Although the second quarter GDP growth improved moderately to 6.2 per cent, this could not be sustained in the third and fourth quarters when the growth rate slowed to 5.0 per cent and 3.8 per cent, respectively (Chart II.3). The behaviour of quarterly real GDP growth during 2000-01 mainly reflected the downward movement in the growth rate of the services sector from 8.6 per cent in the first quarter to 6.3 per cent in the fourth quarter. Real GDP growth from agriculture and allied activities at 0.6 per cent in the first quarter and at 0.5 per cent in the second quarter of 2000-01 reversed the absolute declines recorded in the second half of 1999-2000. The moderate acceleration to 1.0 per cent in the third quarter could not be maintained and the real GDP from this sector registered an absolute decline of 1.4 per cent in the fourth quarter of 2000-01. Real GDP growth in industry improved to 6.1 per cent in the third quarter, after dipping to 5.4 per cent in the second quarter from 6.6 per cent in the first quarter of 2000-01. In the fourth quarter, however, it decelerated to 3.2 per cent (Appendix Table II.2).



2.4 Over the period 1997-2001, quarterly GDP growth has been considerably affected by the

fluctuations in agricultural output. In the case of industry, the growth rate has been moderate at a quarterly average of 4.9 per cent for the same period. The growth rate of services has been fairly robust at a quarterly average of 8.8 per cent over the four-year period including 2000-01.

Saving and Capital Formation

2.5 Quick estimates of the Central Statistical Organisation (CSO) indicate that the rate of gross domestic saving rose marginally to 22.3 per cent in 1999-2000 from 22.0 per cent in the preceding year (Appendix Table II.3). This was mainly on account of an improvement in the rate of household saving -- the principal component of gross domestic saving -- to 19.8 per cent in 1999-2000 from 19.1 per cent in 1998-99. Household sector saving was mainly driven by the increase in the rate of saving in physical assets in 1999-2000, which is essentially related to relatively low rates of return on financial assets in a phase of deceleration in overall economic activity; the rate of financial saving by households dipped to 10.5 per cent in 1999-2000 from 10.9 per cent in the preceding year. In the second half of the 1990s, the households' financial saving rate has generally remained below its peak of 11.9 per cent achieved in 1994-95 (Table 2.1). The rate of household financial saving (gross) in deposits decreased to 4.5 per cent of GDP during 1999-2000 from a high of 6.5 per cent of GDP during 1994-95 while the claims on Government and contractual savings (*i.e.*, provident and pension funds, and insurance funds) moved up to 1.5 per cent of GDP and 4.3 per cent of GDP, respectively, in 1999-2000 from 1.3 per cent of GDP and 3.2 per cent of GDP in 1994-95. This also reflects a lower recourse of households to the capital market (0.8 per cent of GDP from 1.7 per cent of GDP during the same period), which experienced generally depressed conditions during this period. Small savings and contractual savings continued to be the mainstay of household saving, although they were not able to offset the fall in saving rates in the other financial instruments during the second half of the 1990s. Stylised evidence suggests that there were switches by households from deposits to claims on Government and provident funds (Table 2.2 and Appendix Table II.4). The private corporate sector saving rate remained at 3.7 per cent during 1999-2000. The stagnation in the saving rate of the corporate sector can be attributed to low profitability conditions associated with the slackening of industrial activity as well as the subdued capital market. The rate of public saving, which turned negative in 1998-99, deteriorated further to a dissaving of 1.2 per cent in 1999-2000 mainly on account of a widening of revenue deficits in the Centre and States primarily to accommodate the impact of the pay revisions under the Fifth Pay Commission Award (Apperndix Table II.3)

(us percentug					ut curren	it market	prices)
Item	1999-	1998-1	997-98 1	996-971	995-961	994-95 1	993-94
	2000*	99@					
1	2	3	4	5	6	7	8
1. Household saving	19.8	19.1	17.8	17.0	18.1	19.7	18.4
1.1. Financial assets	10.5	10.9	9.9	10.3	8.9	11.9	11.0
1.2. Physical assets	9.2	8.2	8.0	6.7	9.3	7.8	7.4
2. Public sector saving	-1.2	-0.8	1.5	1.7	2.0	1.7	0.6
3. Private corporate saving	3.7	3.7	4.2	4.5	4.9	3.5	3.5
4. Gross Domestic Saving	22.3	22.0	23.5	23.2	25.1	24.8	22.5

Table 2.1: Gross Domestic Saving and Sectoral Saving Rates (as percentage of GDP at current market prices)

		(as p	percentag	e of GDP	at curren	nt market	prices)
Item	1999-	1998-	1997-1	996-97 1	995-961	994-95 1	993-94
	2000*	99@	98@				
1	2	3	4	5	6	7	8
1. Currency	1.1	1.2	0.8	1.0	1.4	1.6	1.6
2. Deposits	4.5	5.2	5.4	5.6	4.4	6.5	5.4
3. Shares and debentures	0.8	0.4	0.3	0.8	0.8	1.7	1.7
4. Claims on Government	1.5	1.6	1.5	0.9	0.8	1.3	0.8
5. Insurance funds	1.5	1.3	1.3	1.2	1.2	1.1	1.1
6. Provident and pension funds	2.8	2.6	2.1	2.2	1.9	2.1	2.1

Table 2.2: Instrument-wise Household Financial Saving Rates (Gross)

* Quick Estimates.

@ Provisional.

Source: Central Statistical Organisation.

2.6 Tentative estimates of the Reserve Bank, based on the latest available information, place the rate of financial saving of households (net of financial liabilities) at 10.5 per cent of GDP in 2000-01 (Table 2.3). Instrument-wise, while the rates of saving in the form of currency, investment in shares and debentures including units of Unit Trust of India (UTI) and contractual savings declined, the rate of saving in the form of deposits is estimated to have moved up to 5.4 per cent in 2000-01 from 4.9 per cent in 1999-2000.

2.7 The net inflow of external saving has remained broadly stable at around 1.4 per cent of GDP in the 1990s with small year-to-year variations. Its contribution to aggregate investment has also remained stable at about 5.6 per cent. During 1999-2000, external saving stood at 1.0 per cent of GDP, as in the preceding year. Accordingly, the rate of gross domestic capital formation (GDCF), *i.e.*, gross capital formation at current prices (GCF) adjusted for errors and omissions, tracked the behaviour of the gross domestic saving rate, moving up to 23.3 per cent in 1999-2000 from 23.0 per cent in 1998-99 (Appendix Table II.3). The sectoral composition of GCF indicates an improvement in the rates of capital formation in the household sector to 9.2 per cent in 1999-2000 from 8.2 per cent in 1998-99 and in the public sector to 7.1 per cent from 6.4 per cent during the same period, mirroring the increase in investments in construction, machinery and equipment by both sectors (Table 2.4 and Appendix Table II.3). On the other hand, the rate of private corporate investment declined to 6.4 per cent in 1999-2000 from 6.6 per cent a year ago. The private corporate investment rate has come down sharply from its average of 7.8 per cent during 1993-98. The slowdown in the corporate investment rate reflected pressure of excess capacity and some erosion in the financial health of corporates during the period of deceleration in overall activity.

Table 2.3: Household Saving in Financial Assets

			(Amount in Rupees crore)			
	Item	2000-01#	1999-	1998-99P	1997-98	
			2000P			
	1	2	3	4	5	
A.	Financial Assets (Gross)	2,64,699	2,44,143	2,09,664	1,71,740	
	a) As per cent of GDP at current market prices	12.1	12.5	11.9	11.3	
	1. Currency	16,901	20,822	21,846	12,780	
	a) As per cent of GDP at current market prices	0.8	1.1	1.2	0.8	
	b) As per cent of Financial Assets (Gross)	6.4	8.5	10.4	7.4	
	2. Deposits@	1,17,364	95,413	82,308	80,062	
	a) As per cent of GDP at current market prices	5.4	4.9	4.7	5.3	
	b) As per cent of Financial Assets (Gross)	44.3	39.1	39.3	46.6	
	3. Claims on Government	34,806	28,951	28,220	22,162	
	a) As per cent of GDP at current market prices	1.6	1.5	1.6	1.5	
	b) As per cent of Financial Assets (Gross)	13.1	11.9	13.5	12.9	
	4. Investment in Shares and Debentures+	7,234	15,516	7,513	5,059	
	a) As per cent of GDP at current market prices	0.3	0.8	0.4	0.3	
	b) As per cent of Financial Assets (Gross)	2.7	6.4	3.6	2.9	
	5. Contractual Saving**	88,392	83,441	69,778	51,677	
	a) As per cent of GDP at current market prices	4.0	4.3	4.0	3.4	
	b) As per cent of Financial Assets (Gross)	33.4	34.2	33.3	30.1	
В.	Financial Liabilities	35,829	35,762	26,687	24,919	
	a) As per cent of GDP at current market prices	1.6	1.8	1.5	1.6	
C.	Saving in Financial Assets (net) (A-B)	2,28,870	2,08,381	1,82,978	1,46,821	
	a) As per cent of GDP at current market prices	10.5	10.6	10.4	9.6	

[#] Preliminary. P Provisional.

@ Comprise bank deposits, non-bank deposits and trade debt (net).

+ Including units of Unit Trust of India and other Mutual Funds.

** Comprise Life Insurance, Provident and Pension Funds.

Notes: 1. Based on the latest available information, these data were revised in July 2001 and hence may not tally with the data published in the Quick Estimates of CSO released in February 2001.

2. Components may not add up to the total due to rounding off.

3. Data on GDP at current market prices for 2000-01 are not yet available from the CSO. In this Report, GDP at current market prices for 2000-01 has been estimated on the basis of the revised estimates of GDP at factor cost at current prices for 2000-01 released by the CSO in June 2001.

	Tuble 2010 Sector while Hutes of Gross Cupitari Formation								
		(as percentage of GDP at current market prices							
	Item	1999-	1998-	1997-	1996-97	1995-96	1994-95	1993-94	
		2000*	99@	98@					
	1	2	3	4	5	6	7	8	
1.	Household sector	9.2	8.2	8.0	6.7	9.3	7.8	7.4	

Table 2.4: Sector-wise Rates of Gross Capital Formation

2.	Public sector	7.1	6.4	6.6	7.0	7.7	8.7	8.2
3.	Private corporate sector	6.4	6.6	8.4	8.4	9.6	6.9	5.6
4.	Gross Capital Formation	22.7	21.2	22.9	22.1	26.5	23.4	21.3
	(1+2+3)							
* Q	uick Estimates.							

@ Provisional.

Source: Central Statistical Organisation.

Macroeconomic Balances

2.8 There has been a consolidation of the overall saving-investment balance during the 1990s as compared with the 1980s. The saving-investment gap, which averaged at 1.4 per cent of GDP in the 1990s, narrowed further to 1.0 per cent in 1999-2000. The narrowing of the saving-investment gap in the 1990s has lent stability to the acceleration of growth which occurred in the decade. On the other hand, accompanying compositional shifts in the public and private saving-investment balances are indicative of incipient fragilities. The saving-investment surplus of the private sector declined from 8.0 per cent of GDP in 1998-99 to 7.8 per cent in 1999-2000. At the same time, the public sector's saving-investment gap widened from 7.2 per cent of GDP to 8.2 per cent (Table 2.5).

2.9 The mainstay of the growth process continues to be capital accumulation. In recent years, attention has been drawn to the close association between the trend components of real output growth, and the rates of saving and investment in India. During the 1990s, however, the deviations of real GDP growth on the one hand, and saving and investment rates on the other, from their respective trend components, have moved in contrasting directions especially in the post-reform period (<u>Chart II.4</u>). This underscores the need for detailed study on the contributions of capital accumulation, human capital formation and productivity to the growth process (<u>Box II.1</u>).



Table 2.5: Macroeconomic Balances

	(as percentage of GDP at current market prices)					
Item	1999-2000*	1998-99@	1997-981	1994-95 to		
				1996-97		
				(Average)		
1	2	3	4	5		
1. Private Saving-Investment Balance	7.8	8.0	5.7	6.4		
2. Public Saving-Investment Balance	-8.2	-7.2	-5.1	-6.0		
3. Net Inflow of resources from abroad	1.0	1.0	1.5	1.4		
4. Errors and omissions	0.6	1.9	2.1	1.8		
Memo Items						
Saving-Fixed Investment Balance	1.0	0.8	1.8	1.3		
of which: Private Saving-Fixed Investment Balance	e 8.5	7.9	6.6	7.3		

* Ouick Estimates.

@ Provisional.

Source: Central Statistical Organisation.

Aggregate Demand

2.10 Compositional changes in nominal aggregate demand in the second half of the 1990s reveal a weakening of investment demand and a rise in consumption expenditure (Table 2.6). These shifts in demand have implications for the sustainability of growth in the medium-term. The rate of fixed capital formation, both government and private, declined from their levels in the high growth phase of 1994-97. During the same period, inventory accumulation moved up in relation to GDP, indicating a deficiency of planned investment demand.

Box II.1 Sources of Growth in the Indian Economy

The characteristics of the uneven growth experience of the 1990s -shifts in the pace and variability of growth between two halves of the decade, the co-movement of real GDP growth and saving and investment rates, the ability of the economy to sustain growth at over 5 per cent in spite of a decline in saving and investment rates in the second half, visual evidence of an improvement in the efficiency of capital use gathered from a downward drift in the incremental capital-output ratio (ICOR)-have drawn attention to the need for an empirical verification of the sources of growth in the Indian economy. The deceleration in economic activity during 1999-2001 is often ascribed to completion of a cyclical catch up following the phase of high expansion in the wake of the institution of structural reforms. It is important, therefore, to distinguish long-term processes from short-term developments dominated by transient conditions. The accounting of growth assumes particular relevance in the context of the emerging imperatives for moving to a higher growth path in the medium-term.

Post-World War II development economics has evolved around the central role of capital accumulation in growth. The Harrod-Domar model had a profound influence on development thinking and it was with the seminal contributions to growth theory in mid-1950s in the neoclassical framework that there was an explicit appreciation of supply side influences on the growth process. Since then, there has been wide acceptance of the view that physical inputs explain only a part of growth, the residual being attributed to gains from disembodied technical progress [total factor productivity (TFP)]. Despite providing a convenient framework for growth accounting, the restrictive and often unrealistic assumptions of constant returns to scale of production and neutral technical progress have been major deterrents to the empirical application of the neo-classical approach. In part, this provoked the evolution of endogenous growth theory towards the end of the 1980s. Attention came to be focused on continuous advances in human skills and technology upgradation through research and development along with factor accumulation to offset the dampening effect of diminishing returns and sustain economic growth. The new growth theories focus on

endogenous determination of technical change, which means endogenous determination of sources of growth.

Cross-country studies relating to developing countries suggest that capital accumulation explains around 60-70 per cent of per capita growth, increases in education and human capital account for another 10-20 per cent and the remaining 30-10 per cent is due to improvements in TFP. Studies conducted on Asian countries indicate that TFP contributed a substantial share of output growth, accounting for about 50-55 per cent of growth in Hong Kong, Singapore, Korea and Taiwan. On the other hand, the assumption of constant returns in these studies has been questioned. The broad inference emerging from these diverse findings is that growth experience is country-specific. Each country's growth performance depends on a number of conditional factors including natural endowments, macroeconomic stability, institutional and social structures, outward orientation and state of financial development. This has supported the belief that while capital accumulation is critical to rapid growth, it is only a necessary condition.

In India, real GDP growth accelerated from 2.9 per cent in the 1970s to 5.8 per cent in the 1980s and further to 6.4 per cent in the 1990s (excluding 1990-91 and 1991-92). This remarkable improvement in growth performance was associated with a substantial decline in variability of output growth. The rate of growth of net fixed capital accumulation increased from 3.6 per cent in the 1970s to 4.2 per cent in the 1980s and further to 5.3 pecent in the 1990s with a distinct decline in variability in the 1990s. The growth in employment, however, declined over the period with some increase in variability in the 1990s. These stylized facts suggest an increasing substitution of capital for labour in the growth process particularly in the recent years, a reduction in the vulnerability of the growth process to short-run instability and a growing contribution of productivity to growth. Recent studies have corroborated the evidence of positive rates of growth of productivity in the 1980s. Some studies have also highlighted the existence of increasing returns to scale of production, with gains in factor productivity attributed to infrastructure, human capital accumulation and expansion in external trade. The increasing adaptability of newer production technologies, expansion of market size being facilitated by the dismantling of barriers and outward orientation of the economy are factors attributed to the existence of increasing returns to scale of production in the scale of production in the Indian economy.

A growth accounting exercise for India was conducted by estimating an economy-wide production function for the period 1970-2000. Output was represented by GDP at factor cost at constant prices, capital accumulation by net fixed capital stock and human capital was proxied by employment in the organised sector. First stage estimations in a simple ordinary least squares procedure indicated serious biases arising from : i) non-stationarity in the variables (all the variables have unit roots; the same order of integration, however, indicates the possibility of exploring for a long-run co-integrating relationship between them), ii) presence of autocorrelation, and iii) evidence of a clear structural break in the growth process between the 1970s and the rest of the period, rendering the estimation of a single production function for the full period 1970-2000 invalid. Accordingly, the production function was re-estimated for a truncated period, *i.e.*, 1982-2000 (to avoid the structural break) by a modified OLS procedure which corrects for collinearity in a semi-parametric manner and yields unbiased estimates of a single co-integrating relationship between the variables.

The results provide robust estimates of the coefficients of capital and labour at 0.7 and 1.2 respectively. The sum of the two coefficients being greater than unity indicates the existence of increasing returns to scale which is confirmed by likelihood ratio tests and corroborated by other studies in the Indian context. The contribution of labour productivity to growth accounts for about 37 per cent. The near unit elasticity of output with respect to labour suggests that in the absence of capital accumulation, the growth of the economy would converge to the rate of growth of the labour force, an approximation of the natural rate of growth of the Indian economy.

Capital accumulation is the principal source of growth, contributing about 59 per cent to the growth process. Consequently, strategies for stepping up the growth trajectory in the medium-term would hinge around substantial increases in capital accumulation along with strategies to enhance factor productivity. This, in turn, would depend upon efforts to mobilise considerably higher saving rates than achieved so far.



The contribution of productivity to growth has been about 4 per cent, varying significantly from negative contributions in the 1980s to positive contributions in the 1990s. Importantly, declines in productivity have substantially dragged down overall growth and improvements in the contribution of productivity to growth have played a critical role in driving real growth above its long-term trend. The results, therefore, emphasise the relatively small but key role of productivity in accelerating growth.

The process of growth in India depends upon a number of underlying conditions. It is necessary, therefore, to carry growth accounting exercises further to identify the factors which enable growth by promoting investment in physical and human capital, by improving the efficiency of production and by encouraging technological progress. In addition, it is necessary to recognize the specific obstacles to growth in India - delays and inadequacies in fiscal adjustments, the tightening infrastructural constraint, continuing high levels of poverty, rigidities in the labour market, capital and technology gaps in the agricultural sector. In all these areas, an appropriate mix of macroeconomic polices could have a catalytic role to play.

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		(as percentage of GDP at current market prices)						
	Item	1999-2000*	1998-99@	1997-98	Average			
					1994-95 to			
					1996-97			
	1	2	3	4	5			
1.	Private Final Consumption	64.5	64.6	63.7	64.9			
2.	Government Final Consumption	12.9	12.0	11.3	10.7			
3.	Private Fixed Capital Formation	14.9	15.0	15.4	15.3			
4.	Government Fixed Capital Formation	6.4	6.3	6.4	7.8			
5.	Change in Stocks	1.4	-0.1	1.2	1.0			
6.	Exports net of Imports	-1.3	-1.7	-1.2	-0.9			
	of which: Exports	11.8	11.1	10.9	10.5			
	Imports	13.1	12.8	12.1	11.4			

Table 2.6: Demand Distribution of Nominal Gross Domestic Product

* Quick Estimates.

@ Provisional.

Source: Central Statistical Organisation.

2.11 Consumption expenditure was the principal factor contributing to nominal aggregate demand. The rate of private final consumption expenditure declined marginally in 1999-2000 in relation to the period 1994-97. On the other hand, the rate of government final consumption increased by more than 2.0 percentage points over the level in the high growth phase. Thus, the improvement in the rate of final consumption was mainly due to a rise in government final consumption.

2.12 In terms of growth in real effective demand, the components exhibited contrasting behaviour. The growth rate of final consumption expenditure which averaged at 6.0 per cent during 1994-97 moved down to an average of 5.6 per cent during 1997-2000. Private final consumption decelerated from an average growth of 6.3 per cent during1994-97 to an average growth of 4.3 per cent during 1997-2000. The growth rate of government final consumption expenditure, on the other hand, moved up sharply from an average of 4.6 per cent during 1994-97 to an average growth of 12.6 per cent during 1997-2000. Annual growth rates of real gross domestic capital formation fluctuated widely during 1995-96 and 1998-99. In 1999-2000, although there was a significant improvement, the growth in real GDCF was lower than the average rate of 11.0 per cent for 1994-97. The growth rate of public sector capital formation accelerated from 5.1 per cent in 1998-99 to 19.0 per cent in 1999-2000 and that of private sector GDCF accelerated from 1.6 per cent to 15.2 per cent resulting in the acceleration of the overall GDCF growth rate from 2.3 per cent to 9.4 per cent over the same period (Table 2.7).

Table 2.7: Growth in Select Sources in Real Effective Demand

	Item	1999-2000*	1998-99@	1997-98	(Per cent) 1994-95 to 1996-97 (Average)
	1	2	3	4	5
1.	Total Final Consumption Expenditure	5.8	7.9	3.0	6.0

	of which: Private Final Consumption	4.1	7.2	1.7	6.3
	Government Final Consumption	15.0	11.7	11.1	4.6
2.	Total Investment+	9.4	2.3	9.5	11.0
3.	Private Investment++	15.2	1.6	16.2	17.0
4.	Public Investment++	19.0	5.1	-0.9	1.4
5.	Total Fixed Investment	8.6	8.6	2.2	10.9
	of which: Private Fixed	8.8	9.1	4.2	16.4
	Public Fixed	8.2	7.5	-2.8	1.9

* Quick Estimates. @ Provisional.

Based on select disposition of real GDP at market prices.

+ Adjusted for errors and omissions.

++ Unadjusted for errors and omissions.

Source: Central Statistical Organisation.

AGRICULTURE

2.13 The performance of agriculture remained subdued in 2000-01, with real GDP growth from agriculture and allied activities at 0.2 per cent during 2000-01 lower than that of 0.7 per cent during 1999-2000. This was substantially lower than the growth of 7.1 per cent achieved during 1998-99 (Appendix Table II.1). The share of agriculture and allied activities in GDP decreased to 24.0 per cent in 2000-01 and 25.2 per cent in 1999-2000 from 26.6 per cent in 1998-99. Its relative contribution to real GDP growth dipped sharply to 0.9 per cent during 2000-01 and 2.8 per cent during 1999-2000 from 28.5 per cent during 1998-99. The inter-quarter movements in these growth rates in agriculture and allied activities have been somewhat volatile with a downward drift (Chart II.5 and Appendix Table II.2).



2.14 Agricultural production declined sharply during 2000-01. The index of agricultural production registered a steep fall of 6.5 per cent in 2000-01 on top of a decline of 0.7 per cent in the previous year (<u>Appendix Table II.5</u>). The fall in crop production in 2000-01 was the result of the sharp decline in foodgrains (6.3 per cent) as well as non-foodgrain crops - mainly oilseeds and cotton. The country received 92 per cent of the Long Period Average (LPA) rainfall during South-West monsoon 2000, with highly skewed spatio-temporal distribution of rainfall coupled

with inadequate precipitation resulting in drought conditions in the States of Chattisgarh, Gujarat, Madhya Pradesh, Rajasthan and Western Orissa. The drought conditions also had an adverse impact on the production of non-foodgrains and *rabi* agricultural production -mainly wheat - as it resulted in shrinking of productive area and consequent production losses. Indian agriculture continues to suffer from natural shocks, technology-gaps, low investment, and inadequate availability of quality inputs. During the second half of 1990s the volatility in the growth of agricultural production has increased (Chart II.6). The combination of these factors has led to a deceleration in the average growth of all crop index to 2.3 per cent during the 1990s from 5.2 per cent during the 1980s.



2.15 The production of total foodgrains declined to 196.1 million tonnes in 2000-01 from the peak of 208.9 million tonnes attained in 1999-2000. The fall was on account of rice (3.2 million tonnes), wheat (7.1 million tonnes), coarse cereals (0.3 million tonnes) and pulses (2.3 million tonnes). Production of rice and wheat declined to 86.3 million tonnes and 68.5 million tonnes in 2000-01 from their respective peak levels of 89.5 million tonnes and 75.6 million tonnes achieved in the previous year. The decline in rice production was mainly due to a decline in the area coverage in West Bengal, which had experienced severe moisture stress at the time of sowing. The decline in wheat output may be attributed to a reduction in area under the crop in Madhya Pradesh, Maharashtra and Rajasthan. Lower production of pulses was due to a decline in production in the major pulses producing States of Madhya Pradesh and Rajasthan. These States also reported substantial fall in their output of coarse cereals.

2.16 The index of non-foodgrains (base: triennium ending 1981-82=100) registered a fall of 6.6 per cent in 2000-01 as compared with a fall of 4.8 per cent in the previous year. The decline in non-foodgrains output was mainly due to fall in the production of oilseeds, cotton and jute and mesta. Oilseeds output declined in the past two years and the level of 18.2 million tonnes recorded in 2000-01 was the lowest in the past eleven years. The production of soyabean, rapeseed and mustard recorded substantial declines because of widespread drought in the oilseeds growing States of Chhattisgarh, Madhya Pradesh and Rajasthan.

The production of groundnut at 6.4 million tonnes, however, recovered to some extent from the 14-year low of 5.3 million tonnes recorded in the previous year - despite the drought conditions

experienced in Gujarat. Cotton registered a sharp decline over its output level in the previous year, while sugarcane, tea and coffee recorded increases in production. Sugarcane output, which has been increasing continuously since 1996-97, scaled yet another peak in 2000-01 at 300.3 million tonnes (Table 2.8).

2.17 During 2000-01, the fall in *rabi* output was much sharper than that in the *kharif* output. The *kharif* foodgrains production showed a fall of 1.7 per cent to 103.1 million tonnes, whereas the *rabi* foodgrains fell by 10.6 per cent to 93.0 million tonnes in 2000-01 from 104.0 million tonnes in 1999-2000. Consequent upon the decline in *rabi* foodgrains production, the share of *rabi* foodgrains to total foodgrains, which had been generally rising during the past two decades, declined in 2000-01 (Chart II.7).

		(Million tonnes)				
	Crop	2000-01	1999-2000	1998-99		
	1	2	3	4		
1.	All crops: Growth Rate+ (per cent)	-6.5	-0.7	+7.9		
2.	Foodgrains	196.1	208.9	203.6		
	2.1 Rice	86.3	89.5	86.1		
	2.2 Wheat	68.5	75.6	71.3		
	2.3 Coarse Cereals	30.3	30.5	31.3		
	2.4 Pulses	11.1	13.4	14.9		
3.	Non-Foodgrains					
	3.1 Oilseeds++	18.2	20.9	24.8		
	Of which : Groundnut	6.4	5.3	9.0		
	: Soyabean	5.1	6.8	7.1		
	3.2 Sugarcane	300.3	299.2	288.7		
	3.3 Cotton @	9.4	11.6	12.3		
	3.4 Jute and Mesta#	10.4	10.5	9.8		
	3.5 Tea*	823.4	805.6	870.4		
	3.6 Coffee*	301.2	292.0	265.0		

Table 2.8: Agricultural Production

+ Based on the Index of Agricultural Production with base: triennium ending 1981-82=100.

++ For nine oilseeds out of eleven in all.

@ Million bales of 170 kg. each.

Million bales of 180 kg. each.

* Million kg. and data for tea on a calendar year basis.

Note: Index of Agricultural Production is based on the latest production estimates (including the latest production figures of Tea, Coffee and other crops.)



2.18 Despite the lower output of rice and wheat during 2000-01, total procurement of foodgrains reached a new peak at 36.5 million tonnes, recording an increase of 16.0 per cent over that of 31.4 million tonnes in 1999-2000 (Appendix Table II.6). On the other hand, the total offtake of rice and wheat during 2000-01 at 18.0 million tonnes was lower by 22.1 per cent than that of 23.1 million tonnes during the corresponding period of the previous year. This decline may be attributed to lower off-take under the Targeted Public Distribution System (TPDS) coupled with Open Market Sales Scheme (OMS), even as there was increased off-take under Other Welfare Schemes (OWS). The sharp decline in the total off-take during 2000-01 was largely reflected under the TPDS category. While the off-take under OWS picked up significantly by 3.55 million tonnes, the OMS during 2000-01 was very low at 1.25 million tonnes as compared with 4.55 million tonnes in 1999-2000. Hence, even a two-and-a-half times increase in the off-take under OWS to 5.0 million tonnes in 2000-01 could not off-set the decline in total off-take under the TPDS category. The sharp rise in procurement and lower off-take resulted in a growth of 55.6 per cent in the stocks of foodgrains to 45.0 million tonnes at end-March 2001 from 28.9 million tonnes at the end-March 2000. The addition of 16.1 million tonnes of foodgrains in 2000-01 has expanded the buffer stock to almost treble its normative level. However, the per capita net availability of foodgrains per day declined from a high of 505.5 grams in 1997 to 470.4 grams in 1999 and further to 458.6 grams in 2000. Concerted efforts are necessary to bring down the quantum of foodgrains through encouraging off-take from the PDS, promoting open market sales including exports and increasing distribution through other welfare schemes.

2.19 Procurement of rice and wheat during the first quarter of 2001-02 (up to June 29) at 23.2 million tonnes was higher by 28.2 per cent than 18.1 million tonnes procured during the corresponding period of the previous year. The procurement of rice during the same period at 2.7 million tonnes was higher than that of 1.9 million tonnes during the corresponding period of 2000-01. The procurement of wheat at 20.5 million tonnes was higher by 26.7 per cent than 16.2 million tonnes procured in the corresponding period of the previous year. The increased procurement of wheat during 2001-02, despite a significant fall in the production of wheat in 2000-01, can be attributed to the increase in Minimum Support Price (MSP). Total off-take of rice and wheat during the first quarter of 2001-02 aggregated 5.1 million tonnes, which was higher by 28.3 per cent as compared with 4.0 million tonnes during the corresponding period of the previous year. Total stocks of foodgrains at end-June 2001 stood at 62.0 million tonnes,

higher by 46.7 per cent, as compared with 42.3 million tonnes at the end of June 2000.

2.20 Direct institutional finance to agriculture has been slowing down in recent years. The average growth in loans outstanding decelerated to 13.6 per cent during the years 1990-99 as compared with 14.1 per cent growth recorded in the corresponding period of the 1980s. Advances, in terms of disbursements, also decelerated to 8.5 per cent per annum during the 1990s from that of 15.8 per cent per annum recorded in the corresponding period of the 1980s. Moreover, during the 1990s, there were contrasting growth profiles in various sources of finance for agriculture. Direct finance to marginal farmers (land holdings up to one hectare) grew at the slowest pace of 12.1 per cent, followed by the credit disbursed to small farmers (land holdings between one and two hectares) at 15.7 per cent per annum. Loans advanced to the large farmers (land holding of above two hectares) grew at the faster pace of 16.1 per cent between 1990-91 and 1998-99.

2.21 Various studies show that with the existing irrigation potential and the current cropping intensity co-efficient with respect to irrigation, the cropping intensity could be raised up to 149.0 as against the current level of 134.2.

2.22 Another area of concern is the declining level of capital formation in Indian agriculture. The ratio of public sector capital formation in agriculture to GDP has fallen to 0.4 per cent in 1998-99 from 1.7 per cent in 1980-81. Moreover, the rate of gross capital formation in agriculture in relation to GDP originating in agriculture has declined to 7.4 per cent in 1999-2000 from 8.9 per cent in 1980-81. The share of capital formation in agriculture and allied activities in Gross Capital Formation (GCF) in the country has also declined substantially from 20.4 per cent in 1951-52 to 6.2 per cent in 1995-96, before recovering to 8.0 per cent in 1999-2000 (Chart II.8).



2.23 The inadequacy of new capital formation has slowed down the pace and pattern of technological change in agriculture with adverse effects on productivity. In this context, there are apprehensions that the boost in output from subsidy-stimulated use of at the expense of deterioration in the aquifers and soil - an environmentally unsustainable approach - which to some extent explains the phenomena of rising costs and slowing growth and productivity in

agriculture.

INDUSTRY

2.24 In terms of the index of industrial production (IIP), the growth of industrial output slowed down to 5.1 per cent during 2000-01 from 6.7 per cent during 1999-2000 reflecting, *inter alia*, low agricultural production, subdued performance of infrastructure (especially power), low investment activity and the presence of excess capacity in many industries (Appendix Table II.7). The slowdown in IIP growth was persistent throughout the year, with brief upturns in October and November 2000. The monthly profile of the IIP during 2000-01 and 2001-02 (up to June) exhibited the general seasonal production behaviour (Chart II.9). The sharp deceleration in production to 3.3 per cent during the last quarter of 2000-01 from 5.9 per cent during the third quarter, however, drove down the growth in IIP for the year as a whole. The sectoral profile showed a pronounced deceleration in manufacturing to 5.4 per cent during 2000-01 from 7.1 per cent during 1999-2000 as well as in electricity to 4.0 per cent from 7.3 per cent in the preceding year. The mining and quarrying sector, on the other hand, improved its growth to 3.7 per cent from 1.0 per cent during 1999-2000.



2.25 The deceleration in industrial activity continued during the first quarter of 2001-02 with the growth rate of IIP at 2.1 per cent, substantially below the growth rate of 6.1 per cent registered during April-June, 2000. During the current year, the slowdown was recorded in all the three sectors, *viz.*, mining and quarrying, manufacturing and electricity which witnessed growth rates of 0.2 per cent (from 3.6 per cent), 2.3 per cent (from 6.4 per cent) and 2.0 per cent (from 5.1 per cent), respectively, as compared with the corresponding period of the previous year.

2.26 During 2000-01, the real GDP growth originating from industry decelerated to 5.3 per cent from 6.1 per cent during 1999-2000 (<u>Appendix Table II.1</u>). While the share of industry remained at around 21.8 per cent during 1998-99 to 2000-01, its relative contribution to the real GDP growth moved up sharply from 9.8 per cent during 1998-99 to 20.8 per cent during 1999-2000 and 22.3 per cent during 2000-01. Quarter-wise industrial GDP growth recovered to 6.1 per cent in the third quarter of 2000-01 after dipping to 5.4 per cent in the second quarter from 6.6

per cent in the first quarter; it, however, dipped to 3.2 per cent in the fourth quarter (<u>Appendix</u> <u>Table II.2</u> and <u>Chart II.10</u>).



Manufacturing Sector

The manufacturing sector, with a weight of 79.36 per cent in IIP contributed to more than 2.27 86.1 per cent to IIP growth in 2000-01. At a disaggregated level, out of 17 two-digit industry groups in the manufacturing sector, positive growth was recorded in 14 groups (68.33 per cent combined weightage in the IIP) as against 12 groups with a weight of 64.97 per cent in 1999-2000. In this category, seven groups (with weightage of 26.01 per cent) registered accelerated growth rates (9 groups in 1999-2000). Seven industry groups (42.32 per cent weightage) recorded decelerated growth (3 groups in 1999-2000) while three other groups (weight being 11.03 per cent) recorded negative growth rates (5 groups in 1999-2000). The industry groups such as 'wool, silk and man-made fibre textiles', 'leather and leather and fur products', 'basic chemicals and chemical products', 'machinery and equipment other than transport equipment', 'cotton textiles', 'basic metal and alloy industries' and 'non-metallic mineral products' which had shown accelerated growth during 1999-2000 recorded either lower or negative growth rates during 2000-01 (Appendix Table II.8 and Chart II.11). The industry groups, such as 'metal products and parts', 'rubber, plastic, petroleum and coal products', 'other manufacturing industries', 'wood and wood products, furniture and fixtures' and 'jute and other vegetable fibre textiles (except cotton)' improved their performance in 2000-01 from absolute declines during 1999-2000. 'Beverages, tobacco and related products', 'wool, silk and man made fibre textiles', 'paper and paper products and printing, publishing and allied industries', 'leather and leather & fur products', 'basic chemicals and chemical products (except products of petroleum and coal)' 'non-metallic mineral products' and 'metal products and parts (except machinery and equipment)' have been the high performance industries recording growth rates of above 5 per cent during four years out of the five year period, 1996-97 to 2000-01 (Appendix Table II.9).

2.28 During the first quarter of 2001-02, twelve (65.20 per cent weight in IIP) out of seventeen two-digit industry groups recorded positive growth, the same number (but with 73.42 per cent weight in IIP) in the previous year. 'Other manufacturing industries' and 'rubber, plastic, petroleum and coal products' achieved high growth rates of 13.7 per cent and 9.6 per cent,

respectively. Five industry groups recorded negative growth rates during 2001-02 (up to June) with the decline sharp in respect of 'metal products and parts (except machinery and equipment)' and 'wood and wood products, furniture and fixtures'.



Use-based Classification

2.29 The use-based classification of the IIP indicated that the poor performance of intermediate, basic and capital goods sectors affected overall industrial growth. The consumer goods sector recorded a higher growth of 8.0 per cent during 2000-01 as against 5.7 per cent during 1999-2000, while the growth of the consumer durables sector moved up marginally. The consumer non-durables sector grew sharply by 5.8 per cent during 2000-01, higher than that of 3.2 per cent recorded during 1999-2000 (Appendix Table II.10 and Chart II.12).



2.30 The slump in the capital goods sector continued to persist during 2000-01. Its relative contribution to the overall IIP growth fell sharply to 3.4 per cent from 10.1 per cent in 1999-2000. This has essentially reflected the dampening of the general investment climate. The growth in capital goods production further decelerated to 1.7 per cent during 2000-01 from 6.9 per cent during 1999-2000 while the capital goods imports continued to show an absolute decline of 2.0 per cent during 2000-01 on top of a fall of 10.9 per cent during 1999-2000 (Chart II.13). Imports of project goods and machine tools continued to register negative growth rates during 2000-01.



2.31 During the first quarter of 2001-02, the basic goods sector registered a lower growth rate of 1.4 per cent in April-June 2001-02 as compared with 5.4 per cent in the corresponding period of the previous year. The capital goods sector recorded an absolute decline of 4.2 per cent in this period as compared with a growth of 5.2 per cent during 2000-01 (April-June). Intermediate goods too posted a lower growth rate of 2.7 per cent during this period as compared with 4.6 per cent in the previous year. The consumer goods sector also witnessed a lower growth rate of 4.3 per cent in the first three months of 2001-02 as compared with 8.6 per cent in the similar period a year ago.

Infrastructure

2.32 The performance of infrastructure industries during 2000-01 deteriorated as compared with the previous year. The composite index of six infrastructure industries, with a combined weight of 26.68 per cent in IIP (base: 1993-94=100), recorded a much lower growth of 5.0 per cent in 2000-01 as against 9.1 per cent in the previous year. During this period, electricity, steel, coal, cement and petroleum refinery products witnessed decelerated/negative growth while crude petroleum registered marginal improvement (Appendix Table II.11). Electricity, a critical infrastructural input, registered a substantially lower growth of 4.0 per cent than the previous year's growth of 7.2 per cent. Steel production exhibited similar behaviour while cement recorded an absolute decline in output as compared with an increase of 14.3 per cent in 1999-2000. In all the infrastructure industries, with the exception of crude petroleum, output fell short of targets (Table 2.9).

Table 2.9: Targets and Achievements of Infrastructure Industries

Sector		Unit		2000-01 P		1999-2000			
		-	Target	Achieve-	Gap	Target	Achieve-	Gap	
				ment	(Per		ment	(Per	
					cent)			cent)	
1		2	3	4	5	6	7	8	
1.	Power	Bill. Units	500.70	499.45	-0.2	469.00	480.68	2.5	
2.	Coal	Mill. Tonnes	308.07	307.87	-0.1	298.90	298.83	0.0	
3.	Finished steel	Thou. Tonnes	13,250.00	12,610.40	-4.8	12,334.00	11,483.70	-6.9	
4.	Railways +	Mill. Tonnes	475.00	473.25	-0.4	450.00	456.42	1.4	
5.	Shipping @	Mill. Tonnes	283.80	280.96	-1.0	258.00	271.92	5.4	
6.	Telecommunications #	Thou. Lines	7,235.00	7,146.07	-1.2	5,870.00	6,717.32	14.4	
7.	Fertilisers	Thou. Tonnes	15,207.60	14,711.60	-3.3	14,412.30	14,288.90	-0.9	
8.	Cement	Mill. Tonnes	107.00	99.94	-6.6	94.00	100.45	6.9	
9.	Crude petroleum	Mill. Tonnes	32.46	32.48	0.0	33.02	31.95	-3.2	
10.	Petroleum refinery products	Mill. Tonnes	112.82	103.48	-8.3	96.87	85.96	-11.3	

P Provisional.

+ Revenue earning freight traffic.

@ Cargo handled at major ports.

Net switching capacity added.

Source: Ministry of Statistics and Programme Implementation, Government of India.

2.33 The poor performance of infrastructure industries observed since November 2000 continued in the first quarter of 2001-02 with a growth of barely 0.8 per cent as compared with that of 8.2 per cent in the same period of the previous year. Electricity, cement and petroleum refinery products decelerated to 2.0 per cent, 2.4 per cent and 6.4 per cent, respectively, as compared with 4.8 per cent, 3.6 per cent and 34.6 per cent in the corresponding period of the previous year. On the other hand, steel, coal and crude petroleum recorded negative growth rates of 0.2 per cent, 0.8 per cent and 4.5 per cent, respectively, during the same period as compared with 12.2 per cent, 11.3 per cent and -2.6 per cent recorded in the same period last year.

Mergers and Acquisitions (M&As)

2.34 M&As were reported for 1,445 companies in 2000-01, marginally lower than 1,492 companies in 1999-2000. The value of deals in these M&As at Rs. 38,054 crore during 2000-01 was lower than Rs. 50,085 crore reported in the preceding year. In 2000-01, mergers occurred in

the sectors of transport and communication, food products, finance, computer software, chemicals & plastics and drugs and pharmaceuticals. Cross-border mergers & acquisitions have been reported mainly in the information technology sector. Within the ambit of the evolving competition policy, both horizontal and vertical mergers among firms would be covered by Competition Law. Mergers involving large enterprises exceeding a prescribed threshold in assets value and turnover would come under the scrutiny of a Competition Commission of India. The Parliament has already passed the Companies (Amendment) Act 2000 thereby underlying the significance and necessity of corporate governance in the wake of M&As.

Small Scale Industries

2.35 Small scale industry (SSI) is an important segment of the economy, contributing substantially in the form of production, employment and exports. The total number of units in the SSI sector increased from 4.2 lakh units as at end-March 1974 to 31.2 lakh units as at end-March 1999 and further to 32.3 lakh units as at end-March 2000, while the value of production (at current prices) of these units increased from Rs.7,200 crore to Rs.5,27,515 crore and further to Rs.5,87,000 crore during the same period. Employment in the SSI sector increased from 39.7 lakh persons to 171.6 lakh persons and further to 178.5 lakh persons during the above period. Exports from the sector increased from Rs.393 crore in 1973-74 to Rs.48,979 crore in 1998-99 and further to Rs.53,975 crore in 1999-2000. A major problem faced by SSIs is the large scale prevalence of industrial sickness.

2.36 Considering the structure of the SSI sector, the Government continued its efforts to provide further support and created an exclusive new Ministry for Small scale Industries and Agro Rural Industries (SSI and ARI) during the year 1999-2000. Furthermore, a comprehensive policy package on the SSI and tiny sector was announced on August 30, 2000 which included, inter alia, raising the exemption for excise duty limit from Rs.50 lakh to Rs.1 crore to improve competitiveness of the small scale sector, enhancing the limit of investment in industry related service and business enterprise from the present level of Rs.5 lakh to Rs.10 lakh and conducting the third census of small scale industries after a gap of 12 years. This census would also cover sickness and its causes. In order to address the problem of collateral faced by the SSI units and to encourage technology upgradation, two new schemes were introduced. The Credit Guarantee Fund (Scheme) for SSI was introduced to provide guarantee for loans up to Rs.25 lakh extended by commercial banks and others without any collateral including third party guarantee while the Credit Linked Capital Subsidy Scheme was introduced for technology upgradation. Credit flows to the SSI sector were also enhanced by increasing the limit for composite loan from Rs.10 lakh to Rs.25 lakh. Furthermore, the Reserve Bank constituted a committee to monitor the flow of credit to SSIs.

2.37 The guidelines issued by the Reserve Bank in May 1999 for constitution of Settlement Advisory Committees for compromise of chronic NPA accounts were modified in July 2000 to provide for one-time settlement of dues mainly to benefit the sick units in SSI sector. In order to review the existing guidelines regarding rehabilitation of sick units and making them transparent and non-discretionary, the Reserve Bank set up a Working Group in November 2000.

SERVICES

2.38 A notable feature in the structural transformation of the Indian economy has been the rapidly expanding role of services in the overall growth process. Besides emerging as a leading sector of the economy with both backward and forward linkages with the primary and secondary sectors, the rising contribution of services to GDP has imparted resilience to economic activity, particularly in the face of adverse agricultural shocks and industrial slowdown. The growth in the services sector has averaged 8.5 per cent during the period 1994-2000 (Appendix Table II.1), reaching a peak of 10.0 per cent during 1995-96. Service sector growth decelerated to 7.5 per cent during 2000-01 mainly due to lowering of the growth rates witnessed in 'community, social and personal services' on account of some evening out of the effect of wage revisions of government employees as well as in 'construction' in the preceding year. The share of services in GDP moved up to 54.2 per cent in 2000-01 from 51.5 per cent in 1998-99 and its relative contribution to overall growth increased even more sharply to 76.8 per cent in 2000-01 from 61.8 per cent in 1998-99. The growth rate of services sector recorded a steady deceleration from 8.6 per cent in the first quarter to 6.3 per cent in the fourth quarter of 2000-01 (Appendix Table II.2). The quarterly growth of services sector has remained fairly robust, averaging at 8.8 per cent in the past four years (Chart II.14).



2.39 The services sector comprises a number of narrowly defined groups classified under 'trade, hotels, restaurants, transport, storage and communication', 'financing, insurance, real estate and business services', 'community, social and personal services' and 'construction'. The post-reform growth dynamics of the real GDP originating in the various sub-sectors of services reveals several distinguishing features. First, the growth of the trade and transport group came down to 7.1 per cent during 1998-99 (Table 2.10), after reaching a high of 13.3 per cent during 1995-96 - the centre of the high growth phase of 1994-97. The industrial slowdown and poor performance in agriculture, thereafter, led to a deceleration in this segment of services to 6.9 per cent in 2000-01, although their growth had recovered moderately to 8.0 per cent during 1999-2000. Secondly, the growth in finance and real estate group exhibited an upward movement during the latter half of the 1990s to touch 11.6 per cent during 1997-98 before settling around 9.1 per cent during 2000-01. This uptrend characterising the recent years essentially reflects buoyancy in the financial services segment in response to financial sector reforms and the robust growth of new economic services such as computer software and information technology (IT).

While the new series of national accounts includes the value addition in the computer software segment in this group, attention has recently focused on an accurate assessment of the size of these service industries in GDP and adequate coverage of the 'new economy' in the national accounts (Box II.2). Thirdly, the spurt experienced in the growth in 'community, social and personal services' to 11.8 per cent during 1999-2000 from 6.3 per cent during 1996-97 was on account of revision in wages and salaries in public administration and defence. Growth in this segment came down to 7.8 per cent during 2000-01. The acceleration of growth in the construction services segment from 2.1 per cent during 1996-97 to 10.2 per cent during 1997-98 reflects the response of real activity to recent policy initiatives. The growth in this segment evened out somewhat to 8.1 per cent during 1999-2000 but is estimated to have decelerated to 5.5 per cent in 2000-01 (Chart II.15 and Table 2.10).

Box II.2 New Economy and National Accounts

In the process of structural transformation of the economy, one of the challenges facing the compilation of national accounts statistics is the proper assessment and measurement of services which are not associated with tangible output and where the process of production and consumption often takes place at the same time. The appropriate accounting of the recent information technology revolution (IT, *i.e.*, computer hardware, software and communication equipment) has become even more challenging on account of the following issues.

First, the new economy segment is partly covered under the contribution of the industrial sector (hardware, *etc.*) and partly under services sector (software services). Secondly, as the technological advancement in computers is often reflected in the dramatic fall in their prices with a consequent substitution of computer services for other inputs of these products, the appropriate measurement of impact of computer related innovations in national accounts is rendered difficult. Construction of a base for benchmarking quality and price changes for IT products, in general, and computers, in particular, is also difficult because of the inherent problems of treatment of depreciation in these products. Thirdly, a proper assessment of the total contribution of IT to the overall real economic activity would always be difficult as the technological progress in this sector benefits the economy not only in terms of the output of this sector but also on account of spillover benefits externalised across a wide heterogeneous spectrum of the other economic activities.

The National Accounts Statistics (NAS) in India presently do not provide any clear segregation of the new (or IT) economy in terms of either hardware or software activities. The production of hardware forms part of manufacturing at the 2-digit level National Industrial Classification (NIC) because of the tangible nature of its production, but without any proper estimation of the value added from the informal sector. The Annual Survey of Industries (ASI) covers the 'manufacture of computer and computer based system' under the 3-digit NIC and these production figures are used in the NAS for the estimation of the GDP originating in hardware production. The contribution of the software sub-sector to GDP is a part of the overall business services that form a part of 'real estate, ownership of dwelling, legal and business services' sector of the national accounts. The value-added per person and number of persons employed are used for estimating the contribution of the segment of business services. The estimates are prepared at constant prices and then estimates at current prices are obtained by superimposing the price effect.

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2.40The buoyancy in services has been facilitated by growth in skill-intensive finance and the computer software group as well as labour-intensive trade and transport group. The high growth in services is suggestive of productivity gains in commodity producing sectors and the concomitant shift in employment away from commodity-producing sectors. Future acceleration in economic activity is thus contingent on the productivity dynamics in the services sector. Apart from efforts needed to raise productivity across the various sub-sectors of services, there is a need to shift the structure of services in favour of the skill intensive and high value added segments so that potential productivity gains can be derived through assimilation of technical progress and innovations. This would necessitate, inter alia, a shift in the demand pattern more towards these service sub-sectors as well as a conducive policy environment for introducing greater competition and efficiency.

		-			((Per cent)
	Sector	2000-01R	1999-2000*	1998-99@	1997-98	1996-97
	1	2	3	4	5	6
1.	Construction	5.5	8.1	6.1	10.2	2.1
		(5.1)	(5.1)	(5.0)	(5.0)	(4.8)
2.	Trade, hotels, restaurants, transport,	6.9	8.0	7.1	7.7	7.8
	storage and communication	(22.3)	(21.9)	(21.6)	(21.5)	(20.9)
3.	Financing, insurance, real estate and	9.1	10.1	8.4	11.6	7.0
	business services	(13.2)	(12.7)	(12.3)	(12.1)	(11.3)
4.	Community, social and personal	7.8	11.8	9.9	11.7	6.3
	services	(13.5)	(13.2)	(12.6)	(12.2)	(11.4)
R	Revised Estimates.					

Table 2.10: Growth and Share of Services in the Gross Domestic Product (at 1993-94 prices)

* Ouick Estimates.

@ Provisional.

Note: Figures in brackets are the shares of the respective sectors in the Gross Domestic Product. Source: Central Statistical Organisation.