

Savings in India - A Critical Analysis

*Mr R Kasilingam **Dr G Jayabal

Abstract

The population in India is growing at an average rate of 2.07 percent per year after independence. To feed its population India has to grow economically both in agriculture and in industrial output. Recent reports show that the Indian economy is growing at the rate of 9 percent and it may touch double digit mark very shortly. To maintain and grow further economically and socially, India requires huge investment in all sectors. India can generate funds from domestic and external sources to meet its investment requirements. The household sector accounts for more than 80 percent of total savings and the contribution from public and private sector is very less and this is different from trend prevailing in other countries. This article attempts to analyse the features and trend of Savings in India. This will provide much needed input to the economic planners and capital market intermediaries to take right decision.

Introduction

Financing socio-economic activities requires large amount of resources, which is not possible to secure from taxation alone. It can be carried through only by a rise in the rate of capital formation. In the opinion of L.G.Whyte (1976) the future welfare of any country depends, to a great extent upon a high level of investment on capital goods. This is possible only by the generation of an adequate volume of savings. The United Nations Committee of experts has observed that the economic progress is a function of the rate of new capital formation. Developing economies lay great emphasis on the importance of domestic savings as they are the

source of investment to break the vicious circle of poverty and under employment. Arthur Lewis (1963) asserts that the obstacle to greater investment in the less developed countries is that their current propensity to save is too low. H.G.Johnson (1969) has gone even to the extent of making a distinction between development and under-development in terms of investment or capital formation. According to Oscar Lange (1978) an under-developed economy is an economy in which the available stock of capital goods is not sufficient to employ the total available labour force with modern techniques of production. Nurkse (1953) has defined countries under-equipped with capital in relation to their population and natural resources as under developed countries.

*Research Scholar, Alagappa Institute of Management, Alagappa University, Karaikudi-630 004
email-id kasimeena@gmail.com 044-24501060

**Reader, Alagappa Institute of Management, Alagappa University, Karaikudi- 630 004,
e-mail id gjbal@rediffmail.com 04565 - 225211, 94431 – 75128

Increased investment or capital formation is also considered to be the main vehicle for initiating progress in technologically backward economies because the rate of growth of capital formation required to absorb new technology is likely to be greater than in advanced economies (Thirlwall, 1972). Colin Clark (1953) has argued that investment should rise at least by four times of growth in population so as to sustain the existing standard of living.

It has been estimated that the rate of saving in the initial stages of growth of present day advanced economies remained nearly 20 percent of their national income. A study on the pattern of savings in Japan during the post war period revealed that the exceptionally high rate of capital formation in Japan resulted from consistent rate of saving of over 20 percent throughout the period, and with such a high rate of savings, Japan could easily surpass even some of the highly industrialized economies of the west (Sinha, 1964).

The volume of aggregate saving is made up of private saving by individuals or business, saving by the companies, and public saving by the Government. This composition may vary from country to country as well as time to time in the same country. In the democratic welfare states like the United Kingdom, Sweden and France, contribution of corporate and

Government savings to the total savings is more than 60 percent whereas in India, Canada and Japan individuals' saving is more, especially in India it is more than 80 percent. This indicates that the higher percentage of corporate savings is due to high industrialization. The reason for less Government savings in welfare states like India is that they have invested a large amount on social services and social well being by borrowing on a large scale. People as individuals need to save not only to meet emergencies and uncertainties in future but also to maintain their status in the society.

I. India's Savings Scenario

The analysis of absolute value of GDS shows that there is a consistent rise every year. The percentage of GDS in GDP has risen from 14.6 percent in 1970-71 to 32 percent in 2006-07. Till the year 1986-87 the GDS was less than 20 percent. During the period of 1986-87 to 2001-02 it hovered around 20 to 25 percent. There is substantial rise only during the years 2001 to 05. The GDS growth rate is from 2.69 percent to 39 percent. The GDS growth rate in absolute terms is not uniform; it varies between 2.69 percent and 39 percent but the percentage of GDS to GDP is increasing consistently. The average growth rate is 15.63 percent which is more than the GDP growth rate. The average percentage of GDS to GDP is 23 percent for the period of last 35 years.

Table 1: GDS Growth Rates at Current Prices

Year	GDS	GDS % of GDP	%Change in GDS
1970-75	9053	15.4	15.77
1976-80	19977	19.6	14.63
1981-85	35502	18.44	13.68
1986-90	76183	20.38	18.47
1991-95	176647	22.84	18.85

1996-00	362305	23.56	13.50
2001-05	677632	28.68	13.51

Source: RBI Handbook of Statistics on the Indian Economy - 2006

As the annual figures show often wide fluctuations and that is mainly owing to the operation of some special factor or combination of factors such as a severe drought during a year which distorts the figure for the year sharply away from the general trend. In order to show the overall trend, these annual figures are averaged over a longer period of five years (quintile) and considered for analysis. From the table 1 it is clear that percentage of GDS to GDP is rising for every quintile period though the absolute growth of GDS is very less during the period of 1996-2000 and this is due to poor growth rate of GDP during that period.

Table 2: Savings as percent of GDP at Current Market Prices

Year	Net Domestic Savings (Rs. crore)	Saving Percent						
		Household Sector			Private Coparate Sector	Public Sector	Gross Domestic Savings	Net Domestic Savings
		Financial Savings	Physical Savings	Total				
1970-75	5077	3.74	7.04	10.76	1.64	3.00	15.42	8.62
1975-80	12002	5.38	8.28	13.64	1.50	4.44	19.60	11.76
1980-85	18257	6.38	6.82	13.16	1.56	3.66	18.44	9.52
1985-90	40717	7.20	8.82	16.04	1.96	2.38	20.38	10.78
1990-95	101943	9.96	8.40	18.40	3.10	1.40	22.84	13.14
1995-00	210934	9.98	8.54	18.50	4.34	0.60	23.42	13.64
2000-05	326059	10.7	11.73	22.52	4.56	-0.66	26.44	14.30

Source: Economic Survey 2005-06

Total savings is constituted by household sector, private sector and public sector. The contribution from household sector to total savings is very significant. The public sector contribution to savings is around 20 percent during 1970-71. The percentage share of public sector savings to GDP is rising till 1982-83 and after that it has started to decline. During the periods 1998-99 to 2002-03 the public sectors contribution is on the negative side which means there was dissaving from that sector. The dissaving has taken place because the Government has engaged in disinvestment activities. The government was doing disinvestment mainly to mobilise money for budget financing and to bring private sector participation in certain areas of

investment. But, now, the public sector companies have started making some savings because some of the public sector undertakings are making good profit and the communist parties which are supporting the government from outside have vehemently opposed to the policy of disinvestment. The savings of private sector is less than 2 percent till 1987-88 and its share is around 4 percent from 1988 to 2003. The private sectors have started earning good profit after liberalisation and that effect is realized in the saving only from 2003 onwards. Household saving is divided into two parts namely financial saving and physical savings. The saving in physical assets will not produce any economic value addition to the economy. The financial savings during early period after independence was very poor because the people were not aware of many saving instruments. It has reached 9.5 percent of GDP in the year 1991-92. After that it was maintaining around 10 percent of GDP. When the sectoral savings of India is compared with other countries, India is having very less contribution from corporate sector. The share of financial savings in household savings is very less when compared with developing countries. Table 2 shows the five years average savings from all the three sectors. The five years average shows that the contribution from household sector is in the continuous rising trend from 10.76 percent of GDS to 22.52 percent. This is more than any other country in the world (China 16%). The private corporate sector savings is also in the rising trend from 1.50 percent to 4.56 percent but still it is very low when compared to other countries like china in which corporate sector contributes 20 percent of GDP. The Government savings in India is very poor than China where it is 6% of GDP.

Table 3: Household Saving Growth Rates at Current Prices

Year	Rs. Crores	% GDP	% GDS	% Change
1970-75	6308	11.7	69.97	13.58
1975-80	13930	15.05	69.55	15.99
1980-85	25508	14.57	71.52	16.22
1985-90	60327	17.88	78.54	20.10
1990-95	141875	20.36	80.42	18.44
1995-00	292271	20.38	78.97	16.14
2000-05	570022	24.36	85.51	10.57

Source: RBI Handbook of Statistics on the Indian Economy 2006

The percentage share of household saving in GDP is around 10 percent in the year 1970-71 and its share is around 25 percent in the year 2004-05. Around 80 percent of gross domestic savings is from household sector which contributes significantly to the GDS. The average percentage of household saving to the GDP is 17.76 and share of household saving in the total saving is 76.35 percent and the average growth rate is 15.86 percent. Though percentage share of household savings on GDP as well as on GDS is rising, its growth rate is declining for the past two five years period. This might be due to changing consumption pattern after globalisation.

Table 4: Correlations

		GDP at Factor cost	GDS (NS)	Household Savings(NS)
GDP at Factor cost	Pearson Correlation	1	0.993	0.995
	Sig. (2-tailed)	.	0.000	0.000
GDS (NS)	Pearson Correlation	0.993	1	0.995
	Sig. (2-tailed)	0.000	.	0.000

The correlation analysis shows that there exists a high correlation between household saving and GDP at factor cost and GDS. The r value for the relationship is 0.995 which is highly significant.

Table 5: Household Savings and Foreign Flow (Rs. Crores)

Year	FDI	Port folio Investment	Foreign Flow	GDS	Household Savings	% Foreign flow	% House hold Saving
1990-91	174	11	185	131340	109897	0.14	83.67
1991-92	316	10	326	143908	110736	0.23	76.95
1992-93	965	748	1713	162906	131073	1.05	80.46
1993-94	1838	11188	13026	193621	158310	6.73	81.76
1994-95	4126	12007	16133	251463	199358	6.42	79.28
1995-96	7172	9192	16364	298747	216140	5.48	72.35
1996-97	10015	11758	21773	317261	233252	6.86	73.52
1997-98	13220	6696	19916	352178	268437	5.66	76.22
1998-99	10358	-257	10101	374659	326802	2.70	87.23
1999-00	9338	13112	22450	487301	416726	4.61	85.52
2000-01	18406	12609	31015	496272	446317	6.25	89.93
2001-02	29235	9639	38874	537966	502674	7.23	93.44
2002-03	24367	4738	29105	648994	565408	4.48	87.12
2003-04	21473	52279	73752	797512	648634	9.25	81.33
2004-05	24870	40029	64899	907416	687079	7.15	75.72

Source: RBI Handbook of Statistics on the Indian Economy 2006

It has already been stated that the major portion of domestic saving of the nation is primarily coming from household sector. Now, household saving is compared with fund coming from abroad. Indian Economy was opened for foreign capital in the year 1990-91. For three years the percentage of foreign flow to GDS was around one percent and in the year 2003-04 it has reached a peak of 9.25 percent to GDS. The average foreign flow is 4.95 percent and average household savings is 81.63. From the above it is clear that FDI inflow is much less than household saving irrespective of huge publicity and importance attached to FDI.

Table 6: Financial Savings of Household Sector (Gross)

Items	2003 - 04	2002 - 03	2001 - 02	2000 - 01	1999 - 00	1998 - 99
Financial Savings (Gross)	100 (15.1)	100 (13.6)	100 (12.7)	100(11.9)	100(12.2)	100(11.9)
a) Currency	10.1 (1.5)	8.5 (1.2)	9.7(1.2)	6.3 (0.7)	8.8(1.1)	10.5(1.3)
b) Deposit	42.9 (6.5)	41.5 (5.7)	39.4(5.0)	41.0(4.9)	36.3(4.4)	38.8(4.6)
i) With banks	40.5	36.3	35.3	32.5	30.8	33.7
ii) With NBFC	0.2	1.6	2.6	2.9	1.7	3.8
iii) Cooperative banks and societies	2.3	3.7	3.6	5.6	4.3	4.6
iv) trade debt net	-0.1	-0.1	-2.1	0.1	-0.4	-3.3
c) Shares and debentures	1.4 (0.2)	1.6(.2)	2.7(.3)	4.1(0.5)	7.7(0.9)	3.4(0.4)
i) private corporate business	0.7	0.8	1.5	3.1	3.4	1.5
ii) Cooperative banks and societies	0.0	0.0	.1	0.0	0.0	0.1
iii) Units of UTI	-0.4	-0.5	-0.6	-0.4	0.8	0.9
iv) Bonds of PSUs	0.0	0.0	0.0	0.1	0.1	0.0
v) Mutual funds	1.1	1.3	1.8	1.3	3.4	0.8
d) Claims on Government	17.7 (2.7)	18.6 (2.5)	17.9(2.3)	15.7(1.9)	12.3(1.5)	13.6(1.6)
i) Investment in G-Sec	4.0	4.3	5.8	1.7	0.9	0.7
ii) Investment in small savings, etc	13.7	14.3	12.1	14.0	11.3	13.0
e) Insurance funds	14.5 (2.2)	15.5 (2.1)	14.2 (1.8)	(13.6(1.6)	12.1(1.5)	11.3(1.3)
i) LIC	14.5	14.8	13.5	12.9	11.2	10.6
ii) Postal insurance	0.1	0.2	0.3	0.2	0.3	0.3
iii) State insurance	0.3	0.5	0.4	0.5	0.6	0.5
f) Provident and pension funds	13 (2.0)	14.30 (2.0)	16.10 (2.0)	19.3(2.3)	22.80(2.8)	22.40(2.7)

Source: Economic Survey 2004-05

Savings in Financial assets is very critical for any developing nation because it provides required capital to the various sectors of the economy. The major portion (on an average 34.78%) of household financial savings is going in the form of bank deposit. The share of bank deposit in the financial saving is rising year by year irrespective of fall in interest rates. This shows that the interest rate is not a motivating factor for savings. The role of NBFC has come down drastically over a period of time in mobilising savings of the public. The deposit in NBFC is accounting for less than 1 percent of total financial savings of households. The flow of household savings to shares and debentures is very less and it is coming down after 2000-01 and in the year 2003-04 it is only 1.4 percent of financial savings. After the failure of

UTI, people have started pulling back fund from UTI and this caused big erosion of fund flow to shares and debentures from household sector. The investment in G-sec is around 4 percent but before 2001-02 it was around 1 percent and this has happened because of reduction in interest rates for bank deposits which has caused big business people to invest in G-Sec. The household investment in small saving schemes is around 13 percent in all the years of the given period. The savings in the provident fund and pension fund was around 22 percent in the year 1998-99 but it has come down to 13 percent in the year 2003-04 which means growth of private sector is not stimulating the savings in pension funds.

Table 7: Savings and Investment

Year	GDS at Current Prices (As percent of GDP)	GDCF at Current Prices (As percent of GDP)	Investment above savings
1950-51	8.9	8.7	-0.2
1960-61	11.6	14.4	2.8
1970-71	14.6	15.4	0.8
1980-81	18.9	20.3	1.4
1990-91	23.1	26.3	3.2
2000-01	23.5	24.2	0.7
2001-02	23.6	23.0	-0.6
2002-03	26.5	25.3	-1.2
2003-04	28.9	27.2	-1.7
2004-05(P)	31.1	31.5	0.4
2005-06(Q)	32.4	33.8	1.4

Source: RBI Handbook of Statistics on the Indian Economy 2006

For the economic growth of any country, capital formation is very essential. But the capital formation

mainly depends upon local savings. When the country is growing and the return on the investment is more, then investment in that country will be more than domestic saving and that may be possible by the inflow of fund from foreign countries. Table 7 shows that investment is more than savings in all the years from 1950 till today except for nine years in the middle. The average savings for the period 1950-51 to 2005-06 is approximately 17.74 and the average investment for that period is 18.89. Therefore the average investment is more by 1.15 percent of GDP than the average savings. It also shows that both GDS and GDCF (Gross Domestic Capital Formation) are on rising trend. The GDCF was 8.7 percent of GDP in the year 1950-51 and it has reached 33.8 percent in the year 2005-06 but still it is less than GDCF of China which is 43.8 percent in the year 2004.

Table 8: Correlations

		GDP at Factor cost	GDS	GDCF
GDP at Factor cost	Pearson Correlation	1	0.993	0.994
	Sig. (2-tailed)	.	0.000	0.000
GDS new series	Pearson Correlation	0.993	1	0.999
	Sig. (2-tailed)	0.000	.	0.000
GDCF New Series	Pearson Correlation	0.994	0.999	1
	Sig. (2-tailed)	0.000	0.000	.
	N	55	55	55

The correlation analysis shows that there exist a significant relationship among GDP, GDS and GDCF. The r value for the relationship between GDS and GDP is 0.993 and the r value for the relationship of GDCF with GDP and GDS is 0.994 and 0.999 respectively.

Table 9: Model Summary

Model	R	R Square	Adjusted R Square	R Square Change	F Change	df1	df2	Sig. F Change
1	0.993	0.987	0.987	0.987	3971.314	1	53	0.000

The regression analysis is carried out by taking GDS as predictor variables and GDP as dependent variable. The r^2 value for the relationship is 0.987 which means 98 percent of variance in GDP can be explained with the help of GDS. The adjusted R^2 is also 0.987 which means there is no much error contribution in r^2 calculation. The F value in the analysis of variance is 3971.314 which is significant at 0.000 level which means the influence of GDS on GDP calculation is very high.

Table 10: Coefficients

		Un standardized Coefficients		Standardized Coefficients	t	Sig.
Model		B	Std. Error	Beta		
1	(Constant)	43222.795	13355.209		3.236	0.002
	GDS	3.429	0.054	0.993	63.018	0.000

The regression line can be written as Y (GDP at factor cost) = 43222 + 3.429 * GDS. This means the GDP is more than three times of GDS.

Table 11: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	R Square Change	F Change	df1	df2	Sig. F Change
1	0.994	0.988	0.987	82597.106	0.988	4242.306	1	53	0.000

As the GDP is the value of goods and services produced in an economy, the goods and services can be produced only by making investment. Therefore, GDCF will be a most appropriate factor in determining GDP of the country. The regression analysis between GDCF and GDP shows that r^2 value for the relationship is 0.988 and adjusted r^2 is 0.987. This means by using GDCF 98 percent of variance in GDP can be explained and adjusted r^2 value shows that there is no effect of standard error in r^2 determination.

Table 12: Coefficients

		Un standardized Coefficients		Standardized Coefficients	t	Sig.
Model		B	Std. Error	Beta		
1	(Constant)	33137.474	13004.921		2.548	0.014
	GDCF	3.423	0.053	0.994	65.133	0.000

The regression equation by taking GDCF as predictor variable and GDP as dependent variable can be written as: $\text{GDP at Factor cost} = 33137 + 3.423 * \text{GDCF}$.

Table 13: Gross Capital Formation of Countries as Percentage of GDP

Countries	1970	1980	1990	2000	2004
Australia	29.4	26.9	22.7	21.7	24.7
Belgium	25.2	23.2	22.5	21.2	18.5
Canada	21.6	23.5	21.6	19.4	20.4
Czech Republic	-	-	25.0	27.7	27.3
Denmark	24.8	29.7	19.5	20.2	19.4
France	23.9	22.8	21.6	19.5	19.2
Germany	27.5	24.4	22.9	21.5	17.4
Greece	25.8	28.6	23.1	23.6	25.4
Hungary	-	-	-	23.5	22.6
Ireland	21.9	27.5	18.7	24.6	25.0
Italy	25.3	25.2	21.5	19.8	19.5
Japan	36.0	32.0	33.3	26.3	23.8
Korea	25.6	32.2	37.1	31.1	29.5
Luxembourg	21.1	24.7	23.5	20.8	19.3
Mexico	19.7	23.8	17.9	21.4	20.2
Netherlands	27.6	22.4	22.5	22.1	20.5
New Zealand	22.9	20.5	18.7	19.6	23.1
Norway	26.9	26.9	21.5	18.6	18.0
Poland	-	-	19.6	23.5	18.2
Portugal	24.3	30.0	26.2	28.1	23.6
Spain	27.6	23.4	26.4	25.8	27.8
Sweden	23.4	21.0	23.1	17.7	16.0
Switzerland	31.3	27.1	29.1	22.8	20.9
Turkey	18.4	15.9	22.9	22.4	17.8
United Kingdom	19.5	18.7	20.5	17.0	16.3
United States	17.9	20.4	17.4	19.9	18.7
EU 15 Average	24.8	24.0	23.0	21.7	20.4
OECD Average	24.8	24.5	23.3	22	21.0
Brazil	-	-	-	19.3	19.6
China	-	29.0	25.8	36.5	43.8
Russian Federation	-	-	-	16.9	17.9
South Africa	24.2	25.8	19.2	15.1	16.4
India	14.8	20.6	24.5	26.0	27.2

Source: World Economic outlook -2004140

Table 13 gives information about capital formation of world's developed countries. Indian capital formation is better than many countries and only few countries like China, Korea, Spain, and Czech Republic have better investment rate than India. From the table it is also clear that our Investment rate surpassed world countries only after 1990 i.e. only after liberalization.

Conclusion

From the analysis it is clear that savings in India have few peculiar features. One such feature is the significant contribution from household savings which is more than the household savings of any other country in the world. Indian households were able to save this much irrespective of less per capita income and high inflation. Normally any developing economy will have high corporate saving. Though Indian economy is growing significantly the corporate saving is not growing to that extent. With respect to forms of savings, the household savings is equally distributed among physical and financial savings. But in any developing country, significant portion of the savings will flow into the financial assets. Even within the financial assets, investment in equity related assets in India is very less when compared to any other developing economy.

Reference

- Arthur Lewis, W. (1963), Economic Development with unlimited supplied of labour, in Agarwala and S.P. Singh (Ed.) The Economics of Underdevelopment, Oxford University Press, New York, p.416.
- Colin Clark, (1953), Population growth and living standards, International Labour review, August. 1953.
- Economic Survey- Indiabudget.nic.in. for 2006-07 and 2005-06, 2004-05.
- Johnson.G.Harry, (1969), Comparative cost and commercial policy theory for a developing world economy, Pakistan Development Review, Supplement, Spring, p.12.
- Nurkse, R.(1953) Problems of capital formation in underdeveloped countries, Oxford University Press, London, p.12.
- Lange,O (1978). Essays on Economic Planning, p.33.
- RBI, (2005), Handbook of Statistics on the Indian Economy, RBI, Mumbai.
- Sinha.M.R. (1964), Savings in the economic growth of post war Japan, Indian Institute of Asian Studies, Asian Studies Press, Bombay, 1984, pp.2-3.
- Thirlwall,A.P. (1972) Growth and Development with special reference to developing economies, Macmillan, p.99.
- Whyte.L.G(1976), Principles of Finance and Investment, Vol II.
- World Economic Outlook, September 2004.