

Implications of Prebisch Singer Hypothesis in Context of India

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ABSTRACT

Historically Less developed countries like India have encouraged export promotion policies to maximize the benefits of International trade. But Prebisch Singer hypothesis presumes that the terms of trade of less developed countries which export mainly primary products remains negative in comparison to the developed countries which generally exports manufacturing goods. The objective of the present study is to analyse the Prebisch Singer hypothesis in context of India. An attempt has been made to study the terms of trade of India for the last five decades by collecting secondary data from various reports. This study supports Prebisch Singer's hypothesis and suggests that under developed countries should diversify their exports and should increase the exports of manufacturing goods to make terms of trade favourable.

Key Words: Terms of Trade, Primary goods, Manufacturing goods, Developed Countries and under developed countries.

INTRODUCTION

In autarky, every country met their needs within its domestic boundaries. Adam Smith and his followers advocated that the countries should enter into international trade, which will result in increase in world trade and welfare of the people. The Classical and Neo-classical economists stated that a country which has absolute or comparative advantages in the production of a particular commodity should specialize and export that commodity and import those commodities from others in which there is absolute or comparative disadvantage. These theories motivated the countries especially less developed countries to enter into international trade. But the fact is that the LDC's did not benefit much from international trade as expressed by Classical and Neo-classical economists.

It was only after World War II that there was concern with the prices of the goods traded by developing economies. The initial view was that these economies would benefit from a rise in the terms of trade, but this view was successfully challenged by Prebisch and Singer in the early 1950s. The Prebisch-Singer thesis enunciates that the secular deterioration in the terms of trade has been an important factor in inhibiting the growth of underdeveloped countries. The terms of trade between peripheral (underdeveloped countries) and the cyclical centers (developed countries) have shifted in favour of the latter because monopolistic elements in their product and factor markets have allowed them to keep the benefit of their technological progress in the form of rising factor incomes, whereas in the former the gains in productivity have been distributed in price reductions. (Prebisch (1950). The specialization of LDCs in exports of food and raw materials to industrialized countries, largely as a result of investment by the latter has been unfortunate for the LDCs because it has led to the deterioration of in terms of trade of LDCs. (Singer 1950). (Kaplinsky 2005). For about 30 years after World War II, trade policies in many developing countries were strongly influenced by the belief that the key to economic development was creation of a strong manufacturing sector, and the best way to create that manufacturing sector was by protecting domestic manufacturers from international competition. Krugman Paul R. and Obstfeld Maurice (2014).

Prebisch and Singer identified two types of negative effects on primary producers' terms of trade. One effect occurs because of systematically different institutional features of product and factor markets, such as cost-plus pricing and the unionization of labour industry. Another negative influence is that of technical progress, both from the asymmetric distribution of its fruits, but also from its asymmetric impact on future demand, favourable to that of industry while unfavourable to that of agriculture (Toye 2003). The secular deterioration in the terms of trade experienced by the periphery represented a significant drag on income growth. But even more damaging to the

primary product producers in the periphery was the high degree of volatility in the terms of trade that exerted a negative impact on growth more than twice the size of the negative impact of the trend. (Blattman, Hwang and Williamson 2003). Nowadays the terms of trade have great importance for developing countries compared to developed countries. Because worsening terms of trade, that all other conditions are constant, reduces economic welfare. It is believed that the decline in the terms of trade of developing to developed countries causes the transfer of income from developing countries to developed and increases the income gap between these two groups of countries. (Naziri, Nemti, Darabi and Raisi 2015).

The Terms of trade appears to have played an important role in explaining (disappointing) growth performance in the less industrialized periphery, neither trends nor volatility seems to have mattered much in the more industrial core, despite the fact that volatility was almost as high in the core as in the periphery. (Blattman, Hwang and Williamson 2003). When the economic early birds of East Asia joined the party of export- oriented development, many of the upper product branches were still available to alight on and they could thus integrate via a quality competitiveness strategy. The opposite is true for South Asian economies, which had to integrate via more competitive markets, potentially through price competition, they either managed to achieve good growth rates given their terms of trade for whatever reason or their growth rates are associated with negative terms of trade development. (Wacker, Grosskurth and Lakemann 2014).

The less developed countries (LDCs) view foreign trade not as a proverbial engine of economic growth but as a mechanism of global income disparities between the rich and the poor countries where the weak are exploited by the strong. Mannur H.G. Terms of Trade fluctuations of industrial countries are heavily influenced by movements in the relative price of manufactured exports and commodity imports. This means that improvements in the terms of trade of developing countries, where the terms of trade are essentially the relative prices of commodity exports and manufactured imports, imply a worsening in the terms of trade of industrial countries, and vice versa. (Kouparitsas M.A. 1997).

Terms of Trade shocks are more frequent in developing countries than in advanced economies. Though persistent negative terms of trade shocks tend to reduce income, some countries have been successful in absorbing shocks and have even managed to increase growth. The Terms of Trade shock reduces the marginal product of factors in the exportable sector and resources shift away from the trade able sector. (Funke, Granziera and Imam 2008).

OBJECTIVES OF THE STUDY

The study mainly analyses the Prebisch Singer hypothesis in context of India. More specifically, the objectives are:

- To analyse India's terms of trade in Pre-reforms period.
- To analyse India's terms of trade in Post-reforms period
- To study the variations in the composition of exports and its impact on terms of trade.

METHODOLOGY

The present study is based on secondary data which is compiled from various issues of Handbook of Economics and Statistics of Indian Economy, RBI Bulletins and various issues of Economic Survey of India for the period from 1970-71 to 2018-19. The statistical tools such as Time Series, Line, and Bar Diagrams are used to present the trends emerged from the data. Besides, Gross, Net and Income terms of trade have been calculated by using standard formulas.

RESULTS AND DISCUSSION

This part of the paper has been divided into two parts. Part-I deals with the analysis of terms of trade during Pre and Post Reforms Period of India. Part-II examines the variations in the composition of exports during Pre and Post reforms period and its effect on terms of trade.

Part -I The Terms of Trade of India in Pre- reforms Period

The terms of trade may be defined as the quantity of imports that can be exchanged for one unit of exports of a country. A favourable change in terms of trade will obviously lead to 'a unit of exports exchanging for more imports than before' (Benham 1960). Terms of trade is an important indicator in the external sector of any economy. Conventionally it used to be considered as the barometer of the dynamics of the welfare gain or loss of a country from international trade. An upward(downward) movement in a nation's terms of trade (i.e. the increase in the relative price of a country's export to import) is good(bad) for that country in the sense that it is to pay less(more) for its imports compared to what it is receiving from exports. Therefore, a declining trend in the terms of trade indicates a possible deterioration in the country's balance of trade. (Masuduzzaman M., Hussain M.I. 2012). India's terms of trade during pre-reforms period i.e. from 1970-71 to 1989-90 is measured in the following table.

Table -1
Terms of Trade in Pre-Reforms Period

(Base Year: 1978-79 = 100)

Years	Unit of Value Index		Quantum Index		Terms of Trade		
	Exports	Imports	Exports	Imports	Gross	Net	Income
1970-71	45.00	35.30	59.00	67.20	113.90	127.50	75.20
1971-72	46.00	32.80	59.0	80.60	136.10	140.20	83.00
1972-73	51.20	34.20	66.50	76.70	115.30	149.70	99.60
1973-74	62.20	48.90	69.50	87.20	125.50	127.20	88.40
1974-75	78.00	84.50	73.70	77.20	104.70	92.30	68.00
1975-76	83.90	99.10	81.70	76.00	93.00	84.70	69.20
1976-77	89.40	96.30	96.80	76.10	78.60	92.80	89.90
1977-78	100.30	88.00	93.20	100.00	107.30	114.00	106.20
1978-79	100.00	100.00	100.00	100.00	100.00	100.00	100.00
1979-80	105.40	114.10	106.20	116.40	109.60	92.40	98.10
1980-81	108.50	134.20	108.10	137.90	127.60	80.80	87.40
1981-82	124.10	133.10	110.10	150.60	136.80	93.20	102.70
1982-83	132.00	136.30	116.70	154.60	132.50	96.80	113.00
1983-84	151.00	125.80	113.00	185.40	164.10	120.00	135.60
1984-85	169.80	161.70	120.80	156.10	129.20	105.00	126.90
1985-86	170.80	158.80	111.30	182.30	163.80	107.60	119.70
1986-87	179.40	139.4	121.30	212.30	175.00	128.70	156.10
1987-88	195.40	160.00	140.00	204.80	146.30	122.10	171.00
1988-89	232.20	185.50	152.10	224.20	147.40	125.20	190.40
1989-90	276.60	228.40	174.90	227.80	130.20	121.10	211.80

Source: Directorate General of Commercial Intelligence and Statistics, Ministry of Commerce, Kolkata

- Note:**
- i Gross terms of trade imply volume index of imports expressed as percentage of Volume index of exports.
 - ii Net terms of trade imply unit value index of exports expressed as percentage of unit value index of imports.
 - iii Income terms of trade imply the product of net terms of trade and volume index of exports expressed as a percentage.

Table-1 incorporates the estimates of Index Number and Terms of Trade of foreign trade for Indian economy taking 1978-79 as the base year (1978-79=100) for the years 1970-71 to 1989-90. Estimates of index number of exports and imports are reported here across Unit value index and Quantum Index. The table shows Gross/Net/Income Terms of Trade of India since 1970-71 to 1989-90. The TOT improved from 1970-71 to 1973-74 significantly and thereafter TOT started turning unfavourable/ hostile for the next three years because not only the prices of imported items increased but also the quantity of imports during these years. In 1977-78 TOT again improved because the prices of exports were higher than the prices of imports. From the year 1979-80 and 1982-83 TOT became unfavourable because both the prices of imports and the quantity of imports were higher than before. After that there was slight improvement in the TOT from 1983-84 to 1989-90. During this period in spite of the larger size of imports, the prices of exported goods kept increasing. Frequent fluctuations in terms of trade have been observed during this time period.

Terms of Trade of India in Post-Reforms Period:

The massive trade liberalization measures adopted after 1991 mark a major departure from the relatively protectionist trade policies pursued in earlier years. The new trade policy reforms seem to have been guided mainly by the concerns over globalization of the Indian economy, improving competitiveness of its industry, and adverse balance of payments situation.

Table-II
Terms of Trade in Post-Reforms Period

Base Year: 1978-79 = 100)

Years	Unit of Value Index		Quantum Index		Terms of Trade		
	Exports	Imports	Exports	Imports	Gross	Net	Income
1990-91	292.00	267.70	194.10	237.70	122.50	109.0	212.10
1991-92	369.50	309.10	208.60	228.00	109.30	119.50	249.40
1992-93	421.50	331.00	222.90	282.00	126.50	127.30	283.80
1993-94	474.10	327.20	257.50	329.10	127.80	144.90	373.10
1994-95	494.60	324.60	292.70	408.30	139.50	152.40	446.00
1995-96	484.20	351.00	384.30	514.80	134.00	137.90	530.10
1996-97	504.70	399.80	411.80	511.80	124.30	126.20	519.80
1997-98	589.40	404.20	386.00	562.10	145.60	145.80	562.90
1998-99	611.70	407.80	399.00	644.00	161.40	150.00	598.50
1999-00	604.00	450.00	461.00	705.00	152.90	134.20	618.80
2000-01	616.08	490.50	576.25	697.95	121.10	125.60	723.80
2001-02	622.12	504.00	580.86	726.15	125.00	123.40	717.00
2002-03	640.24	576.00	691.50	768.45	111.10	111.20	768.60
2003-04	688.56	594.00	742.21	902.40	121.60	115.90	860.40

2004-05	791.24	706.50	825.19	1057.50	128.20	112.00	924.20
2005-06	839.56	805.50	949.66	1226.70	129.02	104.20	989.80
2007-08	954.32	927.00	1046.47	1346.55	128.70	102.90	1077.30
2008-09	1002.64	945.00	1129.45	1536.90	136.10	106.10	1198.30
2009-10	1171.76	1075.50	1230.87	1847.10	150.10	109.00	1341.00
2010-11	1183.84	967.50	1217.04	2030.40	166.80	122.40	1489.20
2011-12	1346.92	1093.50	1401.44	2192.55	156.40	123.20	1726.20
2012-13	1618.72	1912.50	1525.91	1734.30	113.70	84.60	1291.50
2013-14	1715.36	2065.50	1645.77	1840.05	111.80	83.00	1366.80
2014-15	1884.48	2331.00	1742.58	1642.65	94.30	80.80	1408.80
2015-16	1812.00	2331.00	1830.17	1656.75	90.50	77.70	1422.70
2016-17	2246.88	2331.00	1336.90	1508.70	112.90	96.40	1288.70
2017-18	2246.88	2353.50	1442.93	1551.00	107.50	95.50	1377.60
2018-19	2271.04	2308.50	1484.42	1833.00	123.50	98.40	1460.30

Source: Directorate General of Commercial Intelligence and Statistics, Ministry of Commerce, Kolkata

- Note:**
- i Gross terms of trade imply volume index of imports expressed as percentage of Volume index of exports.
 - ii Net terms of trade imply unit value index of exports expressed as percentage of unit value index of imports.
 - iii Income terms of trade imply the product of net terms of trade and volume index of exports expressed as a percentage.

After the introduction of Economic reforms in India and because of policy change, a change in terms of trade has been observed in the Table-II. The quantum index shows higher values than the price index from 1990-91 to 2018-19 which means imports have always been higher than the exports during post reforms period but the prices of exports shows improvement from 1990-91 to 2012-13. Gross terms of trade kept improving throughout the post reforms period. 2014-15 and 2015-16 were the two years where gross terms of trade deteriorated because Prices of imports were higher than the prices of exports although quantity of exports were higher than the imports during these two years, which means more exports were needed to fund lesser imports. Income terms of trade kept increasing throughout the study period because prices of exports were higher than the prices of imports in most of these years. Although quantity of imports overpowered quantity of exports but prices of exports were controlling the damage. Net Terms of trade kept improving from 1990-91 to 2011-12 as the prices of exports were higher than the prices of imports but from 2012-13 to 2018-19 prices of imports started increasing and Net terms of trade started deteriorating. But it can be said that during this time period there was improvement in the terms of trade and frequent fluctuation fluctuations like pre-reforms period were not observed.

Part – II

Composition of Indian Exports during Pre- Reforms Period:

Pre-reforms period (1970-71 to 1989-90) is known as period of controls and regulations. Although there was an atmosphere of export pessimism but still many commodities were exported during this time period. Broad categorization of exports was Primary products, Manufactured goods, Petroleum Products and others. There were many products covered under primary products like (food and live animals, fish and fish preparations, cereals, fruits and vegetables, coffee, tea, spices, feeding stuff for animals, sugar and honey, beverages and tobacco, crude minerals, wool and animal hair, cotton textile, fibre and waste, mica, iron ore and concentrates, manganese ore, lac, mineral fuels, lubricants, animal and vegetable oils and fats, chemicals) etc. Manufacturing goods covered (leather, cotton manufacturing, textile yarn and thread, jute manufacturing, woollen carpets, pearls, manufacturing of metals,

iron and steel, nonferrous metals, machinery, transport equipment, miscellaneous manufacturing articles etc. Year wise exports of all products in pre-reforms period is shown in the following table.

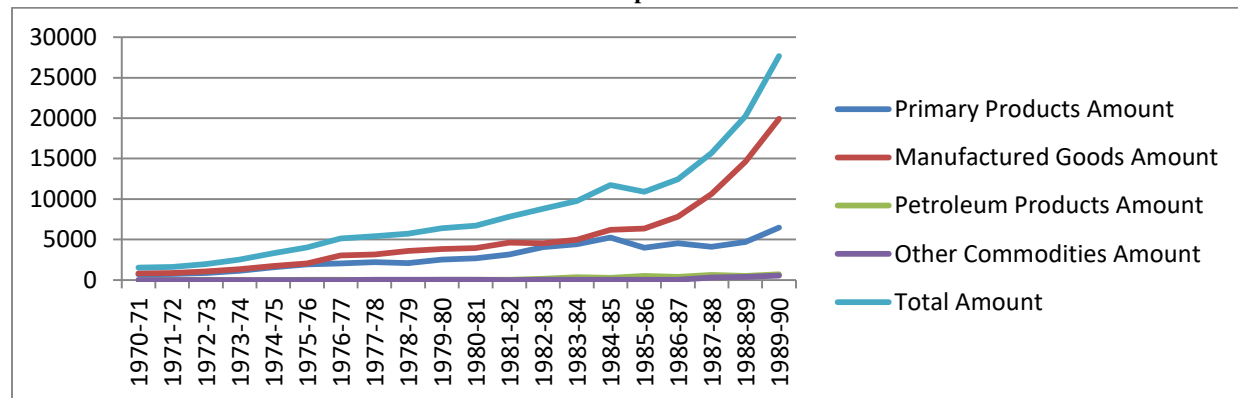
Table -III
Analysis of Composition of Exports during Pre- Reforms Period

(in Rs. Crore)

Year	Primary Products		Manufactured Goods		Petroleum Products		Other Commodities		Total	
	Amount	%age	Amount	%age	Amount	%age	Amount	%age	Amount	%age
1970-71	708.10	46.12	811.90	52.88	8.60	0.56	6.80	0.44	1535.30	100.00
1971-72	730.60	45.43	861.20	53.55	10.60	0.66	5.80	0.36	1608.20	100.00
1972-73	878.20	44.54	1057.50	53.64	29.00	1.47	6.80	0.34	1971.50	100.00
1973-74	1147.30	45.47	1356.20	53.74	12.30	0.48	7.60	0.30	2523.40	100.00
1974-75	1575.00	47.31	1732.50	52.05	13.60	0.41	7.70	0.23	3328.80	100.00
1975-76	1950.30	48.32	2056.10	50.94	18.90	0.47	11.00	0.27	4036.30	100.00
1976-77	2072.60	40.30	3037.40	59.06	18.70	0.36	14.00	0.27	5142.70	100.00
1977-78	2197.90	40.64	3172.40	58.66	15.70	0.29	21.90	0.40	5407.90	100.00
1978-79	2101.30	36.70	3589.30	62.68	14.20	0.25	21.30	0.37	5726.10	100.00
1979-80	2540.30	39.58	3832.00	59.55	18.90	0.29	27.20	0.42	6418.40	100.00
1980-81	2683.30	39.99	3952.30	58.90	24.90	0.37	50.40	0.75	6710.70	100.00
1981-82	3150.10	40.36	4615.40	59.13	24.70	0.32	15.70	0.20	7805.90	100.00
1982-83	4057.20	46.09	4552.20	51.71	171.9	1.95	22.10	0.25	8803.40	100.00
1983-84	4420.20	45.24	4969.30	50.86	357.00	3.65	24.20	0.24	9770.70	100.00
1984-85	5250.30	44.71	6210.30	52.88	255.00	2.17	28.10	0.24	11743.70	100.00
1985-86	3992.80	36.65	6374.30	58.51	509.60	4.68	17.90	0.16	10894.60	100.00
1986-87	4563.00	36.64	7809.00	62.71	411.20	3.30	38.80	0.31	12452.00	100.00
1987-88	4097.80	26.14	10625.60	67.79	648.80	4.14	301.50	1.92	15673.70	100.00
1988-89	4695.80	23.21	14641.40	72.37	505.00	2.50	389.30	1.92	20231.50	100.00
1989-90	6465.20	23.38	19931.70	72.06	696.70	2.51	564.90	2.04	27658.40	100.00

Source: Handbook of Statistics on the Indian Economy (2005, 2010, 2015, and 2020)

Graph-I



Graph-I is based on the Values of Table-III

The Table-III and Graph - I shows that exports of primary products were very high during this time period. In 1970-71 these exports were 46.12 per cent of total exports. During mid-seventies, these exports reached to 48.32 per cent but after that there was a decline of exports of primary products up to 1981-82 but still remained in between 36 to 40 per cent. In 1982-83 exports of primary products again increased to 46.09 per cent and remained above 44 per cent for next two years. After that these exports started falling and reached to 23.38 percent in 1989-90. In comparison to this, exports of manufacturing products have always been higher than the primary products. In 1970-71 exports of manufacturing products were 52.88 per cent and remained more than 50 per cent for almost 15 years. After 1985-86 these exports started increasing and reached to 72.06 per cent in 1989-90. Exports of other products were negligible during this time period. Most of the time, it remained below one per cent. In the year 1987-88 these exports increased above 1 per cent and reached to 2.04 percent in 1989-90. The exports of petroleum products were also below 1 per cent from 1970-71 to 1981-82. These exports exceeded 1 per cent in 1982-83 and increased to 4.14 Per cent in 1987-88. After that there was downward trend in the exports of petroleum products and reached to 2.51 per cent in 1989-90.

Relationship between composition of Indian exports and terms of trade in Pre-reforms period:

It is clear from Table-III and Graph-I that the exports of manufacturing products were always higher than the exports of primary products. But still the percentage of exports of primary products was very high. It was in between 40-48 per cent for 15 years i.e. (1970-71 to 1984-85). It has been observed that during these 15 years terms of trade kept fluctuating and were even unfavourable in between. With the decline in the percentage exports of primary products and after the increase of exports of manufacturing products in the late 1980s terms of trade have shown improvement. This relationship between higher percentage of exports of primary goods and adverse terms of trade behavior in the pre-reforms period seems to be proving Prebisch- Singer hypothesis as true. As the percentage of exports of Primary products started falling after mid- eighties, there was some improvement in the terms of trade.

Composition of Indian Exports during post-reforms period:

In the year 1991 economic reforms were introduced in the Indian economy. The main objective of these reforms was to give boost to the exports. Some significant changes were observed in the economy after the introduction of these reforms. As far as composition of exports is concerned, the structure of India's exports has undergone radical changes during the period under study. The share of important traditional primary products has sharply gone down while that of new or non-traditional items has gone up during post-reforms period. Year wise exports of all products in pre-reforms period is shown in the following table.

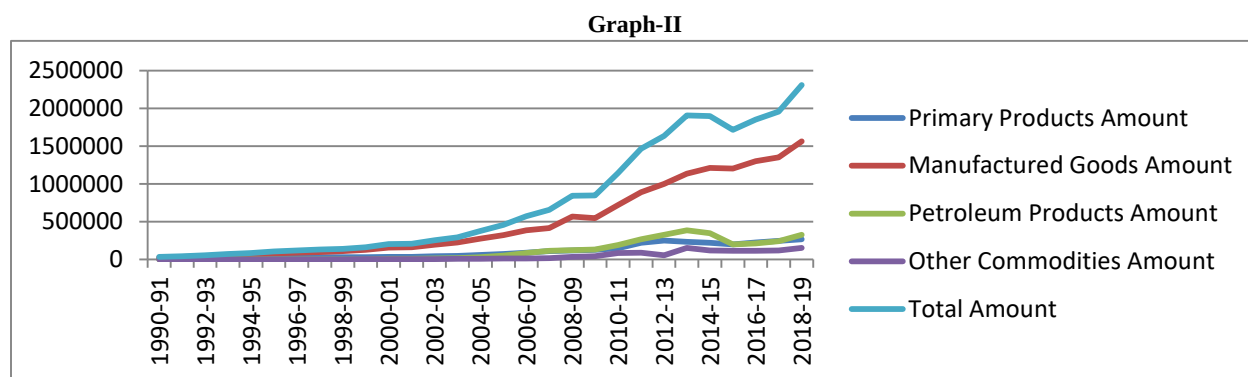
Table-IV
Analysis of Composition of Exports during post-reforms period

(in Rs. Crore)

Year	Primary Products		Manufactured Goods		Petroleum Products		Other Commodities		Total	
	Amount	%age	Amount	%age	Amount	%age	Amount	%age	Amount	%age
1990-91	7758.40	23.83	23319.10	71.62	937.80	2.88	542.30	1.67	32557.60	100
1991-92	10186.70	23.13	32413.40	73.60	1022.30	2.32	419.40	0.95	44041.80	100
1992-93	11218.70	20.90	40659.80	75.73	1379.30	2.57	530.50	0.99	53688.30	100
1993-94	15418.30	22.10	52244.60	74.90	1247.80	1.79	840.70	1.21	69751.40	100
1994-95	16372.60	19.80	64067.10	77.49	1309.00	1.58	925.50	1.12	82674.10	100
1995-96	24274.10	22.82	79433.30	74.69	1517.80	1.43	1128.20	1.06	106353.30	100
1996-97	28524.50	24.01	87377.40	73.54	1710.40	1.44	1204.90	1.01	118817.10	100
1997-98	28569.60	21.96	98659.80	75.83	1311.00	1.01	1560.30	1.20	130100.60	100
1998-99	29146.10	20.86	108506.20	77.64	376.20	0.27	1724.70	1.23	139753.10	100

1999-00	28270.90	17.72	128760.70	80.70	168.50	0.11	2361.30	1.48	159561.40	100
2000-01	32555.60	15.99	156858.40	77.05	8541.70	4.20	5615.40	2.76	203571.00	100
2001-02	34164.60	16.35	159146.40	76.14	10106.60	4.84	5600.40	2.68	209018.00	100
2002-03	42133.30	16.51	194764.50	76.34	12469.20	4.89	5770.30	2.26	255137.30	100
2003-04	45500.40	15.51	222828.80	75.96	16397.40	5.59	8640.10	2.95	293366.80	100
2004-05	60896.90	16.22	272872.20	72.70	31404.20	8.37	10166.30	2.71	375339.60	100
2005-06	72508.40	15.89	321260.80	70.39	51532.80	11.29	11115.90	2.44	456417.90	100
2006-07	89078.00	15.58	384261.40	67.20	84520.10	14.78	13919.70	2.43	571779.30	100
2007-08	110811.20	16.90	414457.70	63.19	114191.70	17.41	16402.90	2.50	655863.50	100
2008-09	116526.00	13.86	566402.00	67.37	123398.00	14.68	34429.00	4.10	840755.00	100
2009-10	125234.00	14.81	546456.00	64.63	132899.00	15.72	40945.00	4.84	845534.00	100
2010-11	149647.00	13.09	719863.00	62.98	188779.00	16.52	84633.00	7.40	1142922.00	100
2011-12	220079.00	15.01	888599.00	60.62	267915.00	18.28	89366.00	6.10	1465959.00	100
2012-13	251374.00	15.37	999612.00	61.13	327679.00	20.04	56597.00	3.46	1635261.00	100
2013-14	232353.00	12.20	1136713.00	59.67	383248.00	20.12	152697.00	8.02	1905011.00	100
2014-15	222000.00	11.71	1209772.00	63.79	346082.00	18.25	118591.00	6.25	1896445.00	100
2015-16	199569.00	11.63	1202933.00	70.09	199638.00	11.63	114244.00	6.66	1716384.00	100
2016-17	223870.00	12.10	1300890.00	70.34	211509.00	11.44	113165.00	6.12	1849434.00	100
2017-18	246763.00	12.61	1350595.00	69.03	241435.00	12.34	117722.00	6.02	1956515.00	100
2018-19	267059.00	11.57	1561875.00	67.68	325863.00	14.12	152868.00	6.62	2307664.00	100

Source: Handbook of Statistics on the Indian Economy (2005, 2010, 2015, and 2020)



Graph-II is based upon the values of Table-IV

The Table- IV and Graph-II depicts that in 1990-91 exports of primary products were 23.83 per cent of total exports of India. This percentage kept falling during the post reforms period and reached to 11.57 per cent in 2018-19. Whereas, exports of manufacturing products were 71.62 per cent in 1990-91 which kept increasing during the first decade of economic reforms and reached to 80.70 per cent in 1999-2000. After that there was some decline in the exports of manufacturing products and finally it reached to 67.68 per cent in 2018-19. Exports of petroleum also started increasing during this time period. These were 2.88 per cent in 1990-91 and gradually it increased to 14.12 per cent in 2018-19. Exports of other commodities have also been increasing slowly. These exports were 1.67 per cent in 1990-91 and have reached to 6.62 per cent in 2018-19. There was significant shift from the exporter of primary products to the exporter of manufacturing products during post reforms period.

Relationship between composition of Indian exports and terms of trade in post-reforms period:

It is very much clear from Table-IV and Graph-II that during post reforms period with the constant fall in the exports of primary products and gradual increase in the exports of manufacturing products terms of trade have shown improvement during post reforms period. The fluctuations as observed in pre-reforms period have reduced significantly. Income terms of trade kept improving throughout the study period. Gross terms of trade have also shown improvement throughout the period. 2014-15 and 2015-16 were the two years where gross terms of trade deteriorated because prices of Imports were higher than the prices of exports. Although, quantity of exports were higher than the imports during these two years which means more exports were needed to fund lesser imports. Net Terms of trade kept improving from 1990-91 to 2011-12 and has shown some deterioration after 2012-13 because of increase in the prices of imports than exports. After the process of economic reforms and policy changes in India, composition of Indian exports has changed a lot. There is a shift from exports of primary products to manufacturing products and this shift has brought improvement in the terms of trade. These results are proving Prebisch-Singer hypothesis in Post- reforms period as well.

CONCLUSION

On the basis of this study, it can be concluded that terms of trade of India's foreign trade were fluctuating and were unfavourable during pre-reforms period because India was exporting mainly primary and agricultural commodities during that time period. But after the process of economic reforms was introduced in India, there was some improvement in the situation. This improvement is because of diversification of exports i.e. exports of manufacturing products and non-traditional products increased during post reforms period. After analysing the terms of trade during last five decades, it can be concluded that Prebisch- Singer Hypothesis has proven to be true in case of Indian foreign trade. During 1970s and 1980s (pre-reforms period) terms of trade were unfavourable because the percentage of primary products exports was high. Income elasticity of demand for these products was less. Moreover price elasticity of demand of these primary products has always been low. But once the process of economic reforms started in India, Composition of Indian exports started changing. With the rise in exports of manufacturing products and fall of primary products, terms of trade started improving. It can be concluded from here that terms of trade of developing countries remains adverse as long as they export more primary products but once they increase the production and exports of manufacturing goods terms of trade starts improving.

POLICY IMPLICATIONS

- India's comparative advantage, as per the factor endowment theory of comparative advantage lies in the export of agricultural and labour intensive products. The performance of India's agricultural exports has, however, been quite poor in comparison to industrial and manufacturing exports. The share of agricultural exports in India's total exports has declined during the last two and half decades. The prospect for the traditional exports has been rather unfavourable. It has, therefore, been clear that a new strategy should aim at promotion of manufacturing products and nontraditional exports.
- There are some concerns about trade, especially between the primary and industrial goods. Traditionally the terms of trade have been against the primary goods in general and agricultural goods in particular. The terms of trade of primary goods have further deteriorated in the course of development. Keeping this fact in view, Govt. of India should encourage exports of industrial goods instead of primary goods.
- Manufacturing sector as well as service sector has emerged as one of the important determinant of export sector in the Indian economy. Thus, in order to improve the performance of export sector, policies must be introduced so that the performance of manufacturing sector and service sector is improved and strengthened in future.
- Diversification of exports is also suggested for increasing Indian exports. The product and market range of the country be diversified so that terms of trade becomes favourable.

- The quality of Indian exports need to be improved. Without improving the quality of exports the quantum of exports will not increase. If efforts are made to improve the quality of exports not only the terms of trade will improve but also the elasticity of Indian exports will increase by this policy.

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