

Research Paper



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INDIA-CHINA: A COMPARATIVE ANALYSIS IN THE LATIN AMERICAN MARKET

Dr. Rohita Deshprabhu Kamat¹¹Assistant Professor, Department of Economics Goa University, South Goa, Goa, India

ABSTRACT

With the commencement of the FOCUS LAC program, began India's elevated economic involvement with the Latin American countries. India's private sector trade as well as investment in the region was supported by this program. In spite of India focussing on strengthening its economic relationship with Latin America, China was able to surpass it in the financial, social and political fields. By seeking out new markets for commodities and services, India's trade with Latin American Countries increased to \$13.13 billion from 2000-2013. However, in the same period, the trade of China with Latin America reached a mark of \$128.67 billion (UNCTAD database). This paper studies the impact of China's trade and India's trade in the Latin American Market.

KEYWORDS: India, Latin America, MERCOSUR, RCAI, Trade

REVIEW OF LITERATURE

Latin America's economic engagement is trade oriented as well as investment based. China holds a lion's share in the trade with Latin America as it deals about seven times more trade and investment than India. While China, focuses on the agricultural, energy and infrastructure related trade and investment, India's focus revolves around pharmaceuticals, manufacturing and information technology, as well as agrochemicals, energy and mining. Both Asian nations import domestic energy production from Latin America. With modernisation the energy consumption of India and China is anticipated to increase. The assessment by the China Energy Group is that energy consumed by the household will be two-fold with urbanization. Keeping this view in mind, from 2005-10, China has made arrangements for investment in the oil originating from the Latin American countries especially from Venezuela. From 2006 to 2010, India dispatched eighteen projects in Latin America for oil exploration most of which were based in Brazil and Colombia. The first energy

cooperation treaty between India and Venezuela was signed in April 2008 which procured each day a quantity of 200,000 barrels of crude oil (Chanda et.al, 2012).

In the article written by R. Viswanathan (2014) states the comparative advantage that China holds in the labour-intensive agrarian commodities like mushrooms, bamboo shoots and garlic and a disadvantage in land-intensive commodities. and hence benefits from the import of such products. India faces significant challenges in terms of irrigation infrastructure, market infrastructure and food distribution. Volatile weather throughout much of the country leads to alternate periods of flooding and drought. Expanding populations and emerging middle classes in China and India will require considerably more food in the near future. South America's major soy producers – Argentina, Brazil, and Paraguay, for example – have benefitted considerably over the past decade from growing Chinese and Indian demand for soya. The area under soya-bean cultivation in these three countries grew 19 percent from 2000 to 2013. China and India increasingly are looking to Latin

America as a supplier not only of soya, but of many other agricultural products. (R. Viswanath, 2014). In any case, both China and India are becoming progressively vital sources of development aid in Latin America. Since China and India are not just similar in size but also with respect to factor endowments, it is therefore important to explore the structure of comparative advantage of India and China and the degree to which the two economies compete with each other in the Latin American market.

OBJECTIVES OF THE STUDY

- 1) To study the bilateral trade of India and China in Latin America.
- 2) To study the Factor Intensity Analysis of India and China in Latin America and the World at the three digit level.

INDIA AND CHINA'S TRADE WITH LATIN AMERICA

Latin America has emerged as an important partner for India, both as an export destination and also an import source. Table 1 presents the top ten commodities of exports to and imports from Latin America for the year 2013. Petroleum, Motor vehicles for the transport of persons, Textile yarn and Motorcycles and cycles are the largest items in India's export basket to Latin America. Petroleum contributes 23.5 percent of the total exports. Similarly, Petroleum oils also hold a major portion of 75.58 percent of the total Indian imports from Latin America followed by Copper ores and concentrates, Fixed vegetable fats and oils, Sugar molasses and honey, etc.

Table 1: India's Top Ten Commodities Trade to Latin America: 2013

EXPORTS			IMPORTS		
Rank	Commodity	Percent	Rank	Commodity	Percent
1	Petroleum oils or bituminous minerals > 70 % oil	23.5	1	Petroleum oils, oils from bituminous materials, crude	75.58
2	Motor vehicles for the transport of persons	7.7	2	Copper ores and concentrates; copper mattes, cement	10.16
3	Textile yarn	6.7	3	Fixed vegetable fats & oils, crude, refined	3.71
4	Motorcycles & cycles	4.2	4	Sugar, molasses and honey	1.29
5	Insecticides & similar products, for retail sale	3.8	5	Gold, non-monetary (excluding gold ores and concentrates)	1.01
6	Medicaments (incl. veterinary medicaments)	3.4	6	Telecommunication equipment & parts	0.53
7	Parts & accessories of vehicles of 722, 781, 782, 783	3.3	7	Wood in the rough or roughly squared	0.43
8	Aluminium	1.9	8	Parts, accessories for machines of groups 751, 752	0.38
9	Medicinal and pharmaceutical products, excluding 542	1.8	9	Crude fertilizers (excluding those of division 56)	0.34
10	Organo-inorganic, heterocycl. compounds, nuclear acids	1.7	10	Inorganic chemical elements, oxides & halogen salts	0.30
Total Top Ten Commodity Exports		58%	Total Top Ten Commodity Imports		93.73%
Others		42%	Others		6.27%
Total		100%	Total		100%

Data Source: UNCTAD database

A significant aspect is that India's top ten commodity imports from Latin America accounts to 93.73 percent as compared to India's top ten commodity exports which account to 58 percent of the total trade.

This implies that, trade is initiated with the preferential trade agreements signed between India and the Latin American countries.

Table 2: China's Top Ten Commodities Trade to Latin America: 2013

EXPORTS			IMPORTS		
Rank	Commodity	Percent	Rank	Commodity	Percent
1	Telecommunication equipment, n.e.s.; & parts, n.e.s.	8.79	1	Iron ore and concentrates	20.75
2	Automatic data processing machines, n.e.s.	3.80	2	Oil seeds and oleaginous fruits (excluding flour)	19.29
3	Optical instruments & apparatus, n.e.s.	3.65	3	Petroleum oils, oils from bitumin. materials, crude	14.86
4	Electrical machinery & apparatus, n.e.s.	2.40	4	Copper ores and concentrates; copper mattes, cemen	9.20
5	Footwear	2.18	5	Copper	8.98
6	Petroleum oils or bituminous minerals > 70 % oil	2.12	6	Cathode valves & tubes	4.66
7	Ships, boats & floating structures	2.00	7	Pulp and waste paper	2.64
8	Furniture & parts	1.98	8	Petroleum oils or bituminous minerals > 70 % oil	1.92
9	Heating & cooling equipment & parts thereof, n.e.s.	1.95	9	Motor vehicles for the transport of persons	1.27
10	Motorcycles & cycles	1.92	10	Sugar, molasses and honey	1.27
Total Top Ten Commodity Exports		30.79%	Total Top Ten Commodity Imports		84.84%
Others		69.21%	Others		15.16%
Total		100%	Total		100%

Data Source: UNCTAD database

Commodity trade between China and Latin America comprises an important part in the two countries trade relationship. China exports a large amount of Telecommunication equipment, Automatic data processing machines and Optical instruments to Latin America. Compared to its exports China imports more of iron ores from Latin America, having a share of 20.75 percent of the total imports. Followed by, Oil seeds and oleaginous fruits and Petroleum oils comprising a share of 19.29 percent and 14.86 percent respectively. Similar to India, a significant aspect in China's top ten commodity imports from Latin America accounts to 84.84

percent as compared to its top ten commodity exports which account to 30.79 percent of the total Chinese-Latin American trade.

Factor Intensity Analysis at the Three Digit Level

In this section, the commodities have been analyzed according to the factor intensity. The factor intensity analysis has been undertaken for India and China with regards to their trade with the Latin American Countries using the HS-3 classification, which has been developed by the United Nations (UNCTAD) with the intention of classifying traded commodities not only on the basis of their material and physical properties, but

also according to the stage of processing, and their economic functions in order to facilitate economic analysis. The categories are followed by categories I, II, III and IV of the UNCTAD classification.

The High skill and technology intensive manufactured commodities hold the dominant share in

India and China's exports to the World and also to the Latin American country. China exports commodities using High skill and technology worth 41.1 billion US dollars to Latin America while India exports commodities using High skill and technology worth 2.9 billion US dollars to Latin America.

Table 3: Manufactured Goods by Degree of Manufacturing: 2013
(Value in Billion US Dollars)

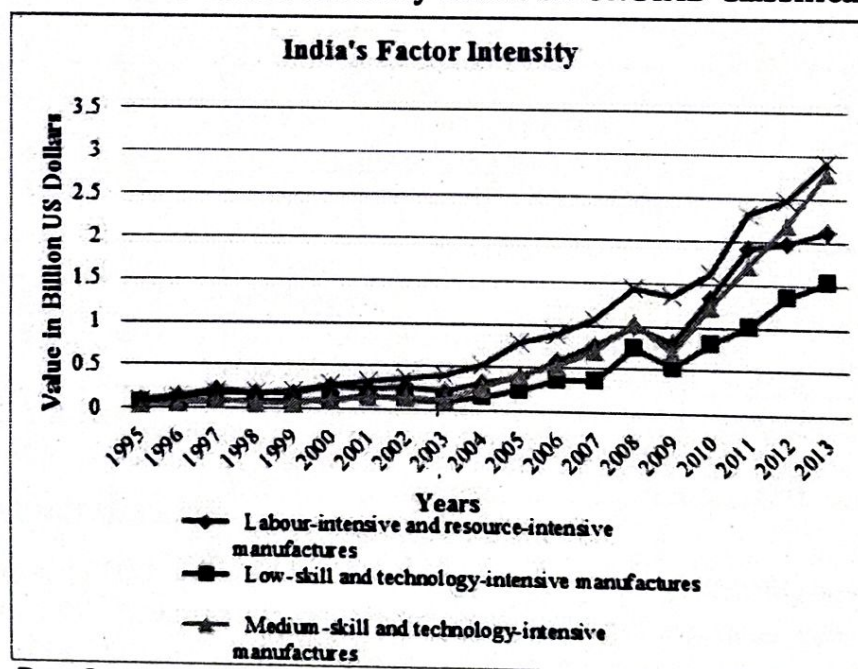
Summary of India's and China's Factor Intensity based on UNCTAD classification							
Category		Exports to the World		Exports to Latin America		Ratio of World export to LA export	
		IND	CHN	IND	CHN	IND	CHN
I	Labour intensive and resource intensive manufactures	46.4	496.0	2.1	27.7	22.10	17.91
II	Low skill and technology intensive manufactures	27.2	215.1	1.5	17.2	18.13	12.51
III	Medium skill and technology intensive manufactures	35.5	512.3	2.8	36.2	12.68	14.15
IV	High skill and technology intensive manufactures	63.0	850.2	2.9	41.1	21.72	20.69

Data Source: UNCTAD database

The second largest category according to the factor intensity is the Medium skill and technology intensive manufactures. Figure 1 graphically shows

India's Factor Intensity based on UNCTAD classification.

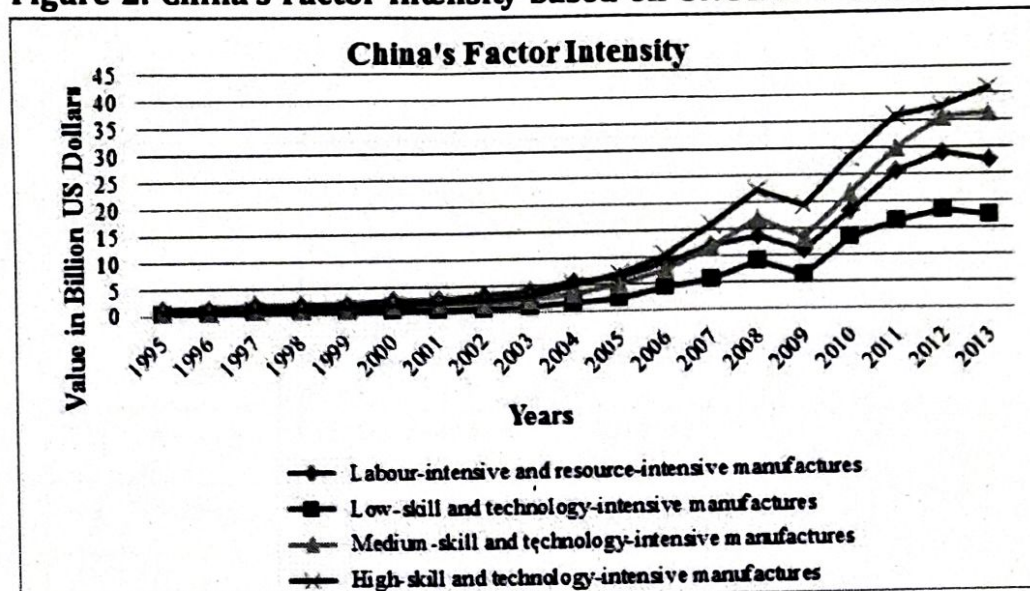
Figure 1: India's Factor Intensity based on UNCTAD Classification



Data Source: UNCTAD database

Among the total 255 commodities, China exports commodities requiring medium skill and technology of worth 36.2 billion dollars to Latin America. While, India exports commodities requiring medium skill and technology of worth 2.8 billion dollars to Latin America. Followed by the Labour and resource intensive manufactures, China's share of Labour and resource

intensive commodities to Latin America is worth 27.7 billion dollars. In contrast, India's share of the Labour and resource intensive commodities comprise of 2.1 billion US dollars. Similarly, China exports 17.2 billion dollars and India exports 1.5 billion dollar commodities which require low skill and technology to manufacture. Figure 2 diagrammatically shows China's Factor Intensity based on UNCTAD classification.

Figure 2: China's Factor Intensity based on UNCTAD Classification

Data Source: UNCTAD database

In the UNCTAD I – category of commodities with labour and resource intensive manufactures, India exports Textiles yarn, Women's clothing, of textile fabrics and Other plastics in primary forms to Latin America. While China exports commodities like

Footwear, Furniture and parts and Baby carriages, toys, games and sporting goods to Latin America. Both India and China exports the commodities of Articles of apparel, of textile fabrics and fabrics, woven, of man-made fabrics to Latin America.

Table 4: Top Labour and Resource Intensive Manufactures: 2013
(Value in Billion US Dollars)

Country	Rank	HS Code	Commodity Description	Exports to the World	Exports to Latin America
India	1	651	Textile yarn	7.1	0.9
	2	842	Women's clothing, of textile fabrics	4.2	0.2
	3	575	Other plastics, in primary forms	2.1	0.2
	4	845	Articles of apparel, of textile fabrics	5.2	0.2
	5	653	Fabrics, woven, of man-made fabrics	2.1	0.1
China		851	Footwear	50.8	2.8
	2	821	Furniture & parts	59.5	2.5
	3	894	Baby carriages, toys, games & sporting goods	38.5	2.4
	4	845	Articles of apparel, of textile fabrics	49.0	2.4
	5	653	Fabrics, woven, of man-made fabrics	19.4	2.1

Data Source: UNCTAD database

In the category of High demand of skill and technology (UNCTAD-IV) India manufactures and exports Insecticides and similar products, Medicaments and Medicinal and pharmaceutical products to Latin America. On the other hand, China clearly dominates in the manufactures of telecommunication equipment,

Automatic data processing machines and Optical instruments and apparatus. India and China together export the manufactures of Organo-inorganic, heterocyclic compounds, nuclear acids to Latin America.

Table 5: Top Manufactures requiring High Demand of Skill and Technology: 2013
(Value in Billion US Dollars)

Country	Rank	HS Code	Commodity Description	Exports to the World	Exports to Latin America
India	1	591	Insecticides & similar products, for retail sale	2.1	0.5
	2	542	Medicaments (incl. veterinary medicaments)	10.8	0.5
	3	541	Medicinal and pharmaceutical products, excluding 542	2.3	0.2
	4	515	Organo-inorganic, heterocyclic compounds, nuclear acids	2.6	0.2
	5	531	Synth. organic colouring matter & colouring lakes	2.0	0.2
China	1	764	Telecommunication equipment, n.e.s.; & parts, n.e.s.	204.46	11.3
	2	752	Automatic data processing machines, n.e.s.	166.59	4.9
	3	871	Optical instruments & apparatus, n.e.s.	39.13	4.7
	4	515	Organo-inorganic, heterocyclic compounds, nuclear acids	14.35	2.2
	5	761	Television receivers, whether or not combined	21.79	1.8

Data Source: UNCTAD database

In the category of manufactures requiring Medium demand of skill and technology (UNCTAD-III), both India and China export the manufacture of Rubber tyres, tyre treads or flaps and inner tubes and Electrical machinery and apparatus to Latin America.

Table 6: Top Manufactures requiring Medium Demand of Skill and Technology: 2013
(Value in Billion US Dollars)

Country	Rank	HS Code	Commodity Description	Exports to the World	Exports to Latin America
India	1	781	Motor vehicles for the transport of persons	5.6	1.0
	2	625	Rubber tyres, tyre treads or flaps & inner tubes	1.9	0.2
	3	722	Tractors (excluding those of 71414 & 74415)	0.9	0.1
	4	582	Plates, sheets, films, foil & strip, of plastics	1.2	0.1
	5	778	Electrical machinery & apparatus, n.e.s.	1.4	0.1
China	1	778	Electrical machinery & apparatus, n.e.s.	52.65	3.1
	2	741	Heating & cooling equipment & parts thereof, n.e.s.	20.83	2.5
	3	759	Parts, accessories for machines of groups 751, 752	37.55	2.4
	4	775	Household type equipment, electrical or not, n.e.s.	35.55	2.4
	5	625	Rubber tyres, tyre treads or flaps & inner tubes	17.01	2.0

Data Source: UNCTAD database

India dominates in the manufacture of Motor vehicles for the transport of persons, Tractors, Plates, sheets, films, foil and strip, of plastics. While, China exports commodities in the manufacture of Heating and cooling equipment and parts thereof, Parts, accessories for Machines of groups 751, 752 and Household type equipment (electrical or not) to Latin America.

FINDINGS

Analysis based on the factor intensity reveals substantial dis-similarities in the commodities for both India and China in the Latin American market. Regarding both the countries, the largest category of Indian and Chinese exports to Latin America are commodities using high skill and technology. A demand for medium skill and technology form the second major category followed by labour intensive and resource intensive manufactures.

In the classification of exports of both the countries, it was apparent that the first category of

exports was dealt with High skill and technology based manufactures. Commodity Organo-inorganic, heterocyclic compounds, nuclear acid dominate in the category-IV for India and China. In the second category, there was a demand for medium skill and technology. Rubber tyres and Electrical machinery occupy a predominant position in the exports to Latin America in this category. For the Labour and resource intensive manufactures, India and China, both the countries dominate in commodities like Articles of apparel and fabrics machine made as well as hand woven fabrics exports to Latin America.

REFERENCES

- 1) Chanda, Rupa, Debasmita Panja and Swapneela Biswas (2012); 'India-Latin America Trade Relationship', website.
- 2) UNCTAD database, International Trade Statistics.
- 3) Viswanathan, R. (2014); 'India and Latin America: A New Perception and a New Partnership', ARI 37/2014 - 22/7/2014.