CUTS Dossier on Preferential Trade Agreements and India

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1. Bangladesh-Japan EPA talks advance, India watches closely

Bangladesh and Japan are moving forward with the signing of an Economic Partnership Agreement (EPA) by December 2025, aiming to strengthen bilateral economic relations and secure duty-free market access for Bangladesh. Senior officials from both countries expressed optimism about the agreement, highlighting its potential to enhance trade, attract foreign investment, and integrate Bangladesh into the global supply chain. Japan, being the world's third-largest economy, presents significant opportunities for Bangladesh's economic growth and development.

However, amid these developments, India should exercise caution and closely monitor the progress of the Bangladesh-Japan EPA negotiations. As Bangladesh seeks to expand its trade relations with Japan, India should assess the potential impact on its own trade interests and competitiveness in the region. India may need to consider strengthening its existing trade ties, diversifying export markets, enhancing competitiveness, and exploring partnership opportunities to navigate the changing trade dynamics effectively.

With Bangladesh-Japan FTA talks progressing, India should remain vigilant and take precautionary measures to safeguard its own trade interests while fostering regional economic cooperation.

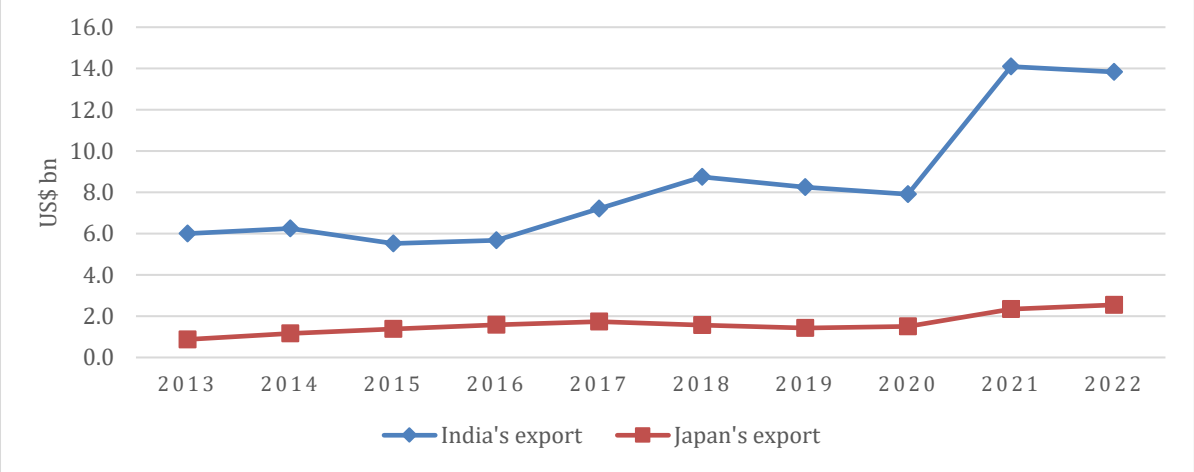
(https://www.dhakatribune.com/bangladesh/foreign-affairs/335113/commerce-secy-epa-to-be-signed-with-japan-by-dec)

CUTS Comments

a) Impact on India's Exports to Bangladesh

Bangladesh is India's fourth-largest export destination. India's value of exports to Bangladesh is much larger than that of Japan. Over time the gap between India and Japan's value of exports to Bangladesh widened as India's exports grew at very high rates after 2016, except in two COVID-affected years. Japan's exports also grew but at a very small pace. In 2022, India's value of exports to Bangladesh was US$ 13.83 billion, while that of Japan was only US$ 2.55 billion.

Figure 1: India and Japan's Exports to Bangladesh, 2013-2022



Source: CUTS computations using data from WITS

Among the key export items of India and Japan to Bangladesh, distillation products, and mineral fuels are found to be common. Other key export items of India to Bangladesh include vegetables, cereals, vegetable oil, cotton yarn and fabrics, ferrous products, vehicles, and pebbles. They collectively constitute 42.75 percent of its total exports to Bangladesh.

In contrast, Japan primarily exports base metals, various other types of vehicles, transport equipment, and machinery. They contribute 82.80 percent of its total exports to Bangladesh.

Now, in order to understand the impact of such FTAs, we have used two indices. They are the Finger-Kreinin Index (FKI) and the Relative Export Competitive Pressure Index (RECPI) (see Annexure I). FKI measures the degree of homogeneity between the export baskets of two source countries to a specific destination country. RECPI, on the other hand, measures whether a country is facing competitive pressure from another country while exporting common export items to a third country.

Table 1.A represents India's FKI values over five years in the Bangladeshi market with Japan as the competitor. FKI values are not significant. They imply that either there is a very small number of common products between India and Japan's export baskets to Bangladesh or the value-addition of those common items in the export baskets of either of these countries is very low. Hence, India does not have a high risk of substantial export loss in the Bangladeshi market as a result of this FTA.

Furthermore, if on average Japan's value of exports in those common products is larger than that of India, the RECPI value will be greater than one. However, an opposite scenario is observed from the RECPI values of Table 1. B below.

Table 1.A: India's FKI with Japan in the Bangladeshi Market					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Japan	0.131	0.132	0.113	0.116	0.170
Table 1.B: India's RECPI with Japan in the Bangladeshi Market					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Japan	0.019	0.021	0.030	0.010	0.022
Source: CUTS Computations using TradeSift software and data from WITS at HS 6-digit level					

A SMART analysis has been conducted to anticipate the adverse effect on India's exports to Bangladesh, which may be realised if Bangladesh offers zero duty on every product to Japan under this FTA. Our findings from SMART analysis indicate that several products of certain sectors such as automobile, metal, electric, and textile may be largely impacted.

Table 2: Trade Diversion likely to be experienced by India

Product Code	Description	Trade Diversion (Thousand US$)
870422	Vehicles; compression-ignition internal combustion piston engine (diesel or semi-diesel), for transport of goods	7224.23
720839	Iron or non-alloy steel; in coils, without patterns in relief, flat-rolled, of a width 600mm or more, hot-rolled, of a thickness of less than 3mm	4495.29
870600	Chassis; fitted with engines, for the motor vehicles	4003.77
761410	Aluminium; stranded wire, cables, plaited bands and the like, (not electrically insulated), with steel core	2826.70
870421	Vehicles; compression-ignition internal combustion piston engine (diesel or semi-diesel), for transport of goods	2131.77
854620	Electrical insulators; of ceramics	1742.59
520942	Fabrics, denim	1264.38
261800	Slag, granulated (slag sand); from the manufacture or iron or steel	1076.24
020230	Meat; of bovine animals, boneless cuts, frozen	811.45
540742	Fabrics, woven; containing 85% or more by weight of filaments of nylon or other polyamides, dyed	462.20
Source: CUTS computations using WITS SMART analysis tool		

Food for Thought

Our analysis presents a clear picture of India's competitive landscape in Bangladesh, highlighting its relatively better position as compared to that of Japan. Factors such as geographical proximity, regional and bilateral trade agreements, and favourable trade policies contribute to India's economic advantage in this market. However, the anticipated adverse effects on India's exports to Bangladesh as a result of this FTA, particularly in sectors such as automobile, metal, electronic, and textile are some concerns. While India has a Preferential Trade Agreement (PTA) with Bangladesh, and there is the Agreement on South Asian Fre Trade Area (SAFTA), addressing these concerns is crucial to retain India's export performance in this market and neutralise the shocks posed by future FTAs that Bangladesh is expected to engage with. That calls for a comprehensive economic cooperation agreement between India and Bangladesh.

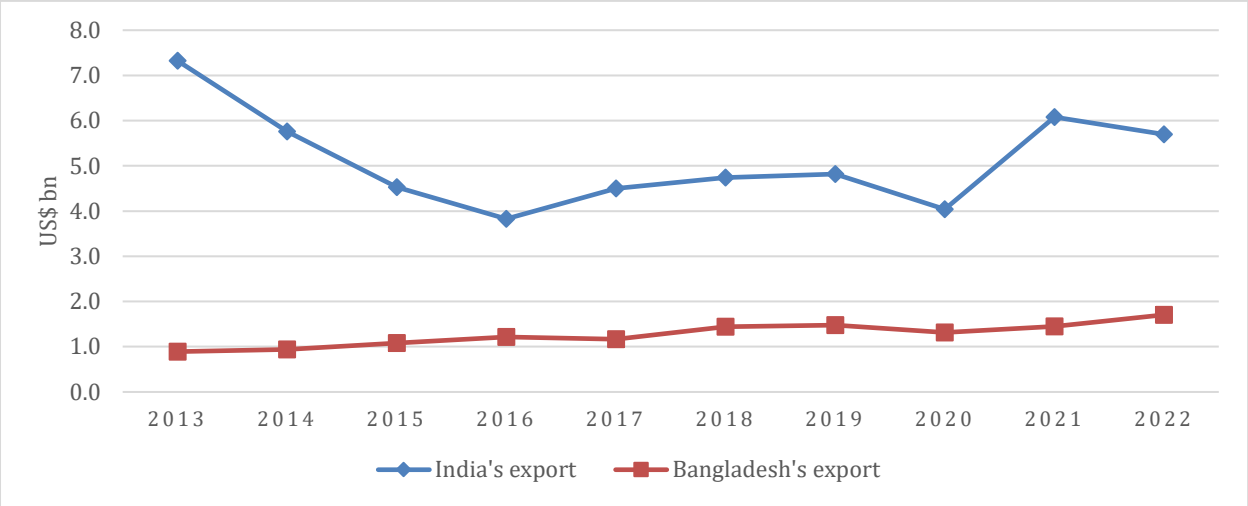
b) Impact on India's Exports to Japan

From 2016, India's exports to Japan started to increase steadily after a three-year downturn phase (2013-2015). After COVID, it again started to increase. However, overall, India's value of exports to Japan has reduced. In 2013, its value of exports was nearly US$ 8 billion. In 2022, it was US$ 5.70 billion.

Bangladesh's exports to Japan are much lower than that of India. However, the gap between India and Bangladesh's value of exports to Japan has been reduced as Bangladesh's exports are growing. Bangladesh's value of exports to Japan reached US$ 1.70 billion in 2022 from below one billion in 2013. India's key export items to Japan include petroleum oils, fish

products, non-industrial diamonds, and ferro-silicon manganese. They contribute 42.76 percent of India's total exports to Japan. Bangladesh's key exports to Japan comprise various types of readymade garments, footwear of both ladies and gents. They contribute 55 percent to Bangladesh's total exports to Japan.

Figure 2: India and Bangladesh's Exports to Japan, 2013-2022



Source: CUTS computations using data from WITS

FKI values (see Table 3.A) indicate a very small number of common items between India and Bangladesh's export items to Japan and those common items contribute a very insignificant share of either of the countries' export baskets. Furthermore, RECPI values indicate that on average India's export value-share and level of exports of common items is relatively larger than that of Bangladesh. They imply that Bangladesh is not a major threat to India in the Japanese market. Hence, this FTA may not do much harm to India's exports to Japan.

Table 3.A: India's FKI with the Bangladesh in Japan					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Bangladesh	0.062	0.068	0.068	0.057	0.059
Table 3.B: India's RECPI with the Bangladesh in Japan					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Bangladesh	0.012	0.013	0.020	0.013	0.119
Source: CUTS computations using TradeSift software and data from WITS at HS 6-digit level					

Our findings from SMART analysis also indicate that India may not face any significant export loss in Japan. India's exports of certain textile and apparel products, and footwear may reduce at a very negligible value.

Table 4: Trade Diversion likely to be experienced by India

Product Code	Description	Trade Diversion (Thousand US$)
420329	Clothing accessories; gloves, mittens and mitts of leather or composition leather	264.82
420310	Apparel; articles of apparel, of leather or of composition leather	2.9
640299	Footwear; with outer soles and uppers of rubber or plastics	0.32
640610	Footwear; parts, uppers and parts thereof, other than stiffeners	0.30
630790	Textiles; made up articles (including dress patterns)	0.27
420330	Clothing accessories; belts and bandoliers, of leather or of composition leather	0.09
420321	Clothing accessories; gloves, mittens and mitts, specially designed for use in sports, of leather or composition leather,	0.07
640291	Footwear; covering the ankle, with outer soles and uppers of rubber or plastics	0.06
420340	Clothing accessories; of leather or of composition leather	0.04
200899	Fruit, nuts and other edible parts of plants	0.01

Source: CUTS computations using WITS SMART analysis tool

Food for Thought

Bangladesh is not a big competitor for India in its access to the Japanese market. India already has tariff advantage in Japan due to its CEPA.[1] However, Bangladesh's textile and apparel sector including footwear is growing fast and gaining high comparative advantage over time. Hence, as Bangladesh is entering into FTAs, India's textile and apparel industry should be concerned about their prospective market access challenges to third-country markets. Though our SMART analysis indicates not a very significant market loss for textile and apparel industry products in Japan, it will be better to take some precautionary measures.

2. Thailand and South Korea to start economic partnership talks this year

Thailand and South Korea are set to embark on negotiations for an Economic Partnership Agreement (EPA), laying the groundwork for a free trade deal anticipated by late 2025 or early 2026. It builds upon existing multilateral partnerships, AKFTA (ASEAN-Korea Free Trade Agreement) and RCEP (Regional Comprehensive Economic Partnership) and aims to deepen cooperation in supply chains and the digital economy.

(*https://www.thestar.com.my/aseanplus/aseanplus-news/2024/03/28/thailand-and-s-korea-to-start-economic-partnership-talks-this-year*)

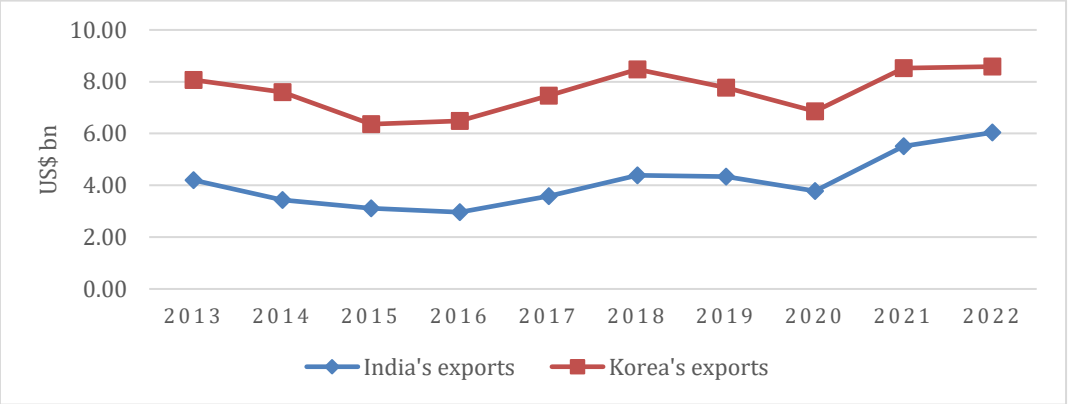
[1] The Comprehensive Economic Partnership Agreement (CEPA) between India and Japan, signed on February 16, 2011, and enforced from August 1, 2011. Under CEPA, a significant portion of bilateral trade's tariff has been eliminated.

CUTS Comments

a) Impact on India's Exports to Thailand

Both India and South Korea's exports to Thailand are moving in a similar pattern. India's exports after 2016 and South Korea's exports after 2015 have grown steadily at more or less similar rates before the COVID pandemic. After COVID, both countries' exports to Thailand have started to grow again at a similar rate. However, there is a constant on an average US$ two billion export gaps observed between South Korea and India's value of exports to Thailand over the past ten years. In 2022, India's value of exports to Thailand was US$ 6.04 billion, while that of South Korea was US$ 8.58 billion.

Figure 3: India and South Korea's Exports to Thailand, 2013-2022



Source: CUTS computations using data from WITS

Among the top ten exports of India and South Korea to Thailand, the only common item is petroleum oils and oils from bituminous minerals (HS code 271019). India's other key exports to Thailand include diamonds, combustion piston engines, bovine meat, medicaments, parts and accessories of vehicles, dried products, and unwrought aluminium. On an average, they contribute 33 percent of India's total exports to Thailand.

South Korea's other key exports to Thailand include hot-rolled and flat-rolled stainless steel, coated flat-rolled iron, printed circuits, primary styrene polymers, electronic integrated circuits, warships, and lifeboat vessels. On an average, they contribute 22 percent to South Korea's total exports to Thailand.

Table 5.A presents the FKI values for the past five years from 2018-2022 for India in Thailand's market, when South Korea is the competitor. They indicate that either there is a small number of common items between India and South Korea's export baskets to Thailand or the contribution of those common items to the total value of exports is small for either of the countries. Furthermore, the values have decreased over time. RECPI values (see Table 5.B below) indicate that on an average India's level of exports and export value-share of common items is much larger than that of South Korea. It implies that there is not much possibility of reduction of India's exports to Thailand as a result of this FTA.

Table 5.A: India's FKI with South Korea in Thailand					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
South Korea	0.173	0.196	0.168	0.160	0.162
Table 5.B: India's RECPI with South Korea in Thailand					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
South Korea	0.080	0.102	0.052	0.033	0.039
Source: CUTS computations using TradeSift software and data from WITS at HS six-digit level					

The findings from SMART analysis show that India's exports of some processed food products may be relatively more affected. However, the value of export loss may not be very significant.

Table 6: Trade diversion likely to be faced by India

Product Code	Description	Trade Diversion (Thousand US$)
170199	Cane Or Beet Sugar	152.64
030617	Shrimps and prawns	118.52
200899	Fruit and other edible part of plants	59.94
350510	Dextrins and other modified starches	55.32
210690	Food preparations	53.52
130219	Vegetable saps and extracts	47.05
400700	Rubber; vulcanised, thread and cord	21.44
330590	Hair preparations	20.17
160420	Fish preparations; fish minced or in forms, prepared or preserved	20.03
520527	Cotton yarn (other than sewing thread), containing 85% or more by weight of cotton, not put up for retail sale	15.75

Source: CUTS computations using WITS SMART analysis tool

Food for Thought

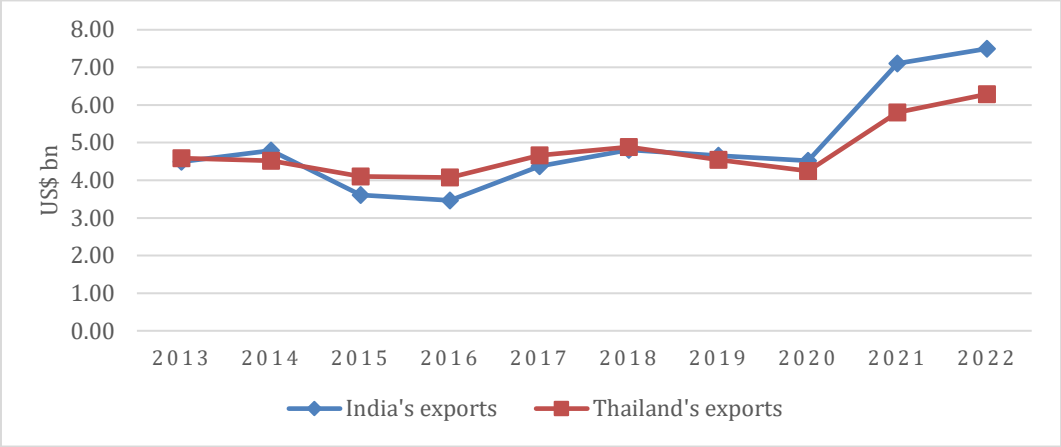
In complement to India's 'Act East' policy, Thailand's 'Act West' policy is about improving the economic relations between the two countries. Besides them, many initiatives like establishing a free trade area with Thailand, the BIMSTEC (Bay of Bengal Initiative for Multi-Sectoral Technical and Economic Cooperation) free trade area and the recent Memorandum of Understanding to enhance the engagement of Thailand with the industries of Telangana through trade and investment have been inked. India's exports and investments in Thailand have also increased in the past few years.

However, this FTA between Thailand and South Korea may significantly improve South Korea's overall exports to Thailand, which is already larger than that of India. At the same time, our findings from FKI, RECPI, and SMART analyses indicate that South Korea may not harm much to India's exports. There may be some specific sectors of India whose exports to Thailand may reduce. Our findings from SMART analysis have identified one such sector, which is food processing.

b) Impact on India's Exports to South Korea

Both India and Thailand's value of exports to South Korea is very close to each other. India's export performance to South Korea has improved over time. During 2015-2017, India's value of exports to South Korea was slightly below that of Thailand. After COVID, India's exports grew at relatively higher rates than that of Thailand and its value of exports became larger than that of Thailand. In 2022, India's value of exports to South Korea was US$ 7.50 billion, while that of Thailand was US$ 6.29 billion.

Figure 4: India and Thailand's Exports to South Korea, 2013-2022



Source: CUTS calculations using data from WITS

Among the top ten key export items of India and Thailand to South Korea, only petroleum oils and oils from bituminous minerals (HS code 271019) are found to be common. India's other key exports to South Korea include unwrought metals (aluminium, lead, zinc), ferro-alloys, copper cathodes, oil cakes and cereals. On an average, they contribute 46 percent to India's total exports to South Korea.

Thailand's other key exports to South Korea include rubber in primary form or sheets, waste and scrap aluminium, air conditioning machines, electronic integrated circuits, and magnetic and optical readers. On an average, they contribute 24 percent to its total exports to South Korea.

The FKI values indicate there is are small number of common items between India and Thailand's export baskets to South Korea and the average export value share of those common items is small for either of the countries. And, the FKI values are in decreasing momentum. It means that the relative importance of common items in the export basket is decreasing over time. Furthermore, RECPI values indicate that on an average India's export value-share and the level of exports of common items is much higher than that of Thailand. Hence, Thailand is not a significant competitor of India in South Korea's market as their export baskets are not very similar.

Table 7.A: India's FKI with Thailand in South Korea					
Competitor	**2018**	**2019**	**2020**	**2021**	2022
Thailand	0.110	0.120	0.104	0.095	0.072
Table 7.B: India's RECPI with Thailand in South Korea					
Competitor	**2018**	**2019**	**2020**	**2021**	2022
Thailand	0.058	0.031	0.008	0.054	0.014
Source: CUTS computations using TradeSift software and data from WITS at HS six-digit level					

Our findings from SMART analysis indicate that Indian exports under the categories of vehicle parts, electronic accumulators, vegetable seeds, electronic transformers, combustion engines and iron or steel articles may face a relatively large trade diversion in Thailand. However, the value of export loss may not be so large.

Table 8: Trade Diversion likely to be faced by India

Product Code	Description	Trade Diversion (Thousand US$)
870850	Vehicles; parts, drive-axles with differential, whether or not provided with other transmission components	350.30
850710	Electric accumulators; lead-acid, of a kind used for starting piston engines, including separators, whether or not rectangular (including square)	206.71
120991	Seed; vegetable seed, of a kind used for sowing	144.76
850422	Electrical transformers; liquid dielectric, having a power handling capacity exceeding 650kVA but not exceeding 10,000kVA	83.89
870899	Vehicles; parts and accessories	76.68
840820	Engines; compression-ignition internal combustion piston engines (diesel or semi-diesel engines)	49.86
732690	Iron or steel; articles	49.17
853710	Boards, panels, consoles, desks and other bases; for electric control or the distribution of electricity, (other than switching apparatus of heading no. 8517), for a voltage not exceeding 1000 volts	44.80
730640	Steel, stainless; tubes and pipes, welded, of circular cross-section	34.72
845090	Washing machines; parts for household or laundry-type	33.10

Source: CUTS computations using WITS SMART analysis tool

Food for Thought

As much as there is a possibility of this FTA affecting India's exports to South Korea, the FKI index has shown that there is a small importance of common products in the export baskets of India and Thailand. Additionally, the RECPI figures have shown that India has a relatively larger share in the common exports to South Korea. Therefore, the competition from Thailand might not be large enough to affect India's export to South Korea. However, some specific sectors such as automobile parts, electronics, metal may be of concerns. The India-South Korea Comprehensive Economic Partnership Agreement (2010) is under review so that that are more benefits to Indian exporters. Indian trade negotiators should focus on the sectors with high potential for export loss in South Korea.

3. Indonesia, Sri Lanka launch Preferential Trade Agreement negotiations

It is claimed that Sri Lanka is one of the most important partners in the Southeast Asia region. Therefore, a PTA will boost economic growth, enhance market access and will also be the first step towards an FTA between Sri Lanka and Indonesia. The first round of negotiation might happen in the first semester of 2024. The Preferential Trade Agreement seeks to enhance the export of Indonesian products to Sri Lanka like palm oil, paper, and fatty acids.

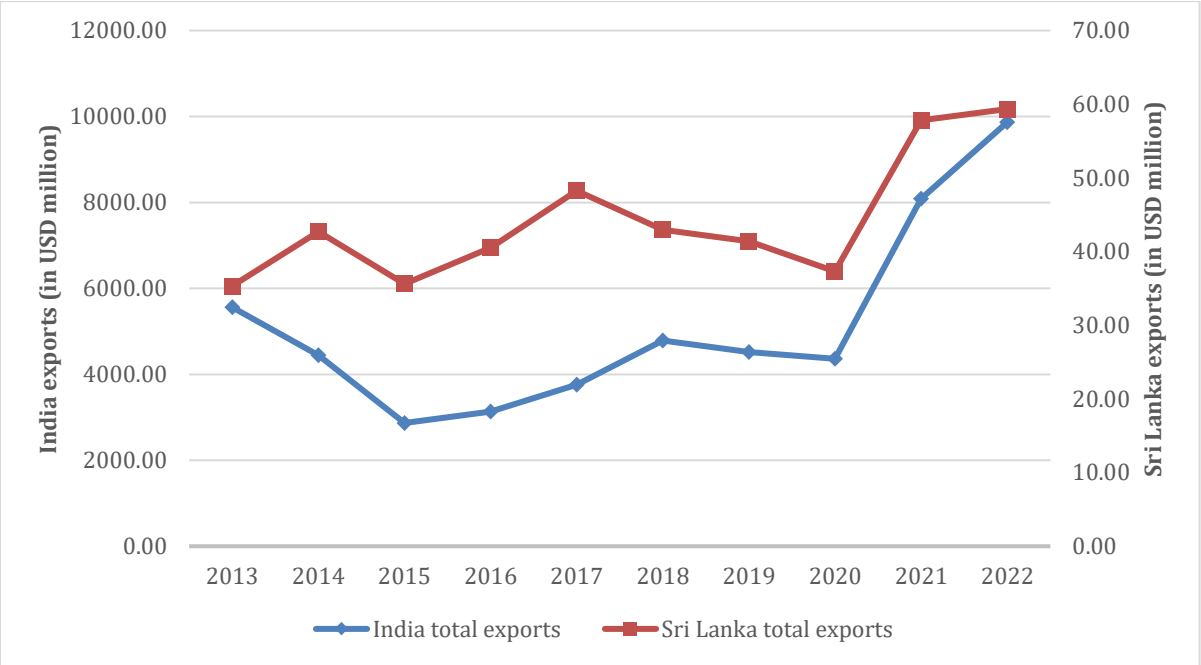
(*https://jakartaglobe.id/business/indonesia-sri-lanka-launch-preferential-trade-agreement-negotiations*)

CUTS Comments

a) Impact on India's Exports to Indonesia

India's value of exports to Indonesia is multiple times larger than that of Sri Lanka. In 2022, the value of India's exports to Indonesia was US$ 9.87 billion, while that of Sri Lanka's was just US$ 59.34 million. Also, both countries experienced a more or less similar pattern of export growth to Indonesia over the past ten years.

Figure 5: India and Sri Lanka's Exports to Indonesia, 2013-2022



Source: CUTS computations using data from WITS

Among the key export items of India and Sri Lanka to Indonesia, only petroleum oils and oils obtained from the bituminous minerals (HS code 271019) are found to be common. India's other key export items to Indonesia include cane or beat sugar and chemically pure sucrose, vessels, chemicals like cyclic hydrocarbons like para-xylene, ground nuts, cereals like corn (maise), frozen boneless buffalo meat, floating or submersible drilling or production platforms, and semi-finished products of iron or non-alloy steel. They constitute 44.35 percent of India's annual exports to Indonesia.

Sri Lanka's other key export items to Indonesia include wheat or meslin flour, tobacco partly or wholly stemmed, machinery for preparing and making up tobacco, certain apparel and clothing accessories, knitted or crocheted fabrics made of dyed cotton, turbo jets, and miscellaneous chemicals like binders for foundry mould or core. They constitute 43.75 percent of Sri Lanka's annual exports to Indonesia.

Table 9.A represents India's FKI values over the last five years in the Indonesian market with Sri Lanka as its competitors. The FKI values are low and decreasing over time. They indicate a very small number of common products in India and Sri Lanka's export baskets to Indonesia and their importance in respective export basket is also small. Also, RECPI values (see Table 9.B below) indicate that on an average India's export value-share and the level of exports of common products is much higher than that of Sri Lanka. Thus, India does not face any competitive pressure from Sri Lanka in the export of common items to Indonesia.

Table 9.A: India's FKI with Sri Lanka in Indonesia					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Sri Lanka	0.029	0.049	0.042	0.040	0.024
Table 9.B: India's RECPI with Sri Lanka in Indonesia					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Sri Lanka	0.00027	0.00053	0.00036	0.00014	0.00002
Source: CUTS computations using TradeSift software and data from WITS at HS 6-digit level					

Furthermore, for a better understanding of possible trade diversion, which is likely to be faced by India from Sri Lanka in the Indonesian market as a result of this FTA, a SMART analysis has been carried out. As shown in Table 10 below, India's exports of paper and paper-made products, printed books, parts of motor cars, wood charcoal and various preparations of foods are likely to be affected.

Table 10: Trade Diversion likely to be experienced by India

Product Code	Description	Trade Diversion (Thousand US$)
480255	Copier Paper made from Prime Quality Paper	455.50
382319	Industrial Monocarboxylic Fatty Acids	415.25
480256	Uncoated paper and paperboard	326.48
440290	Wood Charcoal (including Shell Or Nut Charcoal)	286.79
870710	Bodies for the industrial assembly of motor cars and other motor vehicles principally designed for the transport of persons	282.72
480257	Cylinder mould vat made watermarked banknote paper	244.34
210690	Different preparations of food	236.65
400121	Natural Rubber in Smoked Sheets	217.73
491199	Printed books, newspapers, pictures and other products of the printing industry; manuscripts, typescripts and plans	156.44
481019	Prime Quality Art Paper with both sides coated	120.12

Source: CUTS computations using WITS SMART analysis tool

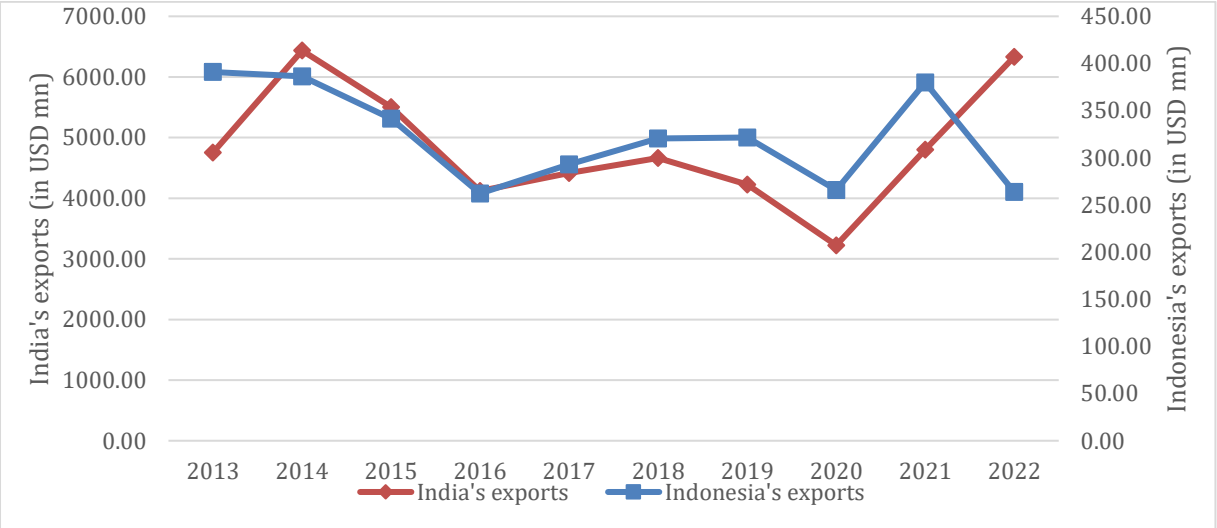
Food for Thought

Sri Lanka is not a big competitor of India in the Indonesian market. Sri Lanka's exports to Indonesia are much lower as compared to India. However, our findings from FKI and RECPI analyses indicate that India does have a few common export items with Sri Lanka and India's level of exports of common items is much higher. From our SMART analysis we have found that certain products majorly from the paper industry for which India's exports may fall.

b) Impact on India's Exports to Sri Lanka

India and Indonesia's exports to Sri Lanka are moving in a more or less similar pattern. However, India's value of exports to Sri Lanka is multiple times larger than that of Indonesia. After COVID, India's value of exports to Sri Lanka became double within two years. On the other hand, while in 2021, Indonesia's exports to Sri Lanka grew significantly, in 2022, there was a sharp fall. In 2022, India's exports to Sri Lanka stood at US$ 6.33 billion), whereas that from Indonesia to Sri Lanka was US$ 263.77 million.

Figure 6: India and Indonesia's Exports to Sri Lanka, 2013-2022



Source: CUTS computations using data from WITS

Key items of India's exports to Sri Lanka include airplanes, petroleum oils, piston engines, floating or submersible drilling or production platforms, medicaments, vessels, cane or beet sugar, motorcycles, and aeroplanes. They constitute 45.77 percent of India's total exports to Sri Lanka. Similarly, Indonesia's key export items to Sri Lanka include semifinished products of iron or nonalloy steel, anthracite and bituminous coal, technically specified natural rubber, cement, stemmed stripped products of tobacco, palm oil, agricultural fertilizers, areca nuts. They constitute 36.34 percent of Indonesia's total exports to Sri Lanka.

FKI values over the past five years (as shown in Table 11.A) indicate that either there are a few numbers of common items between India and Indonesia's export baskets to Sri Lanka or on an average the export value-share of the common export items is small for both countries. Also, RECPI values (as shown in Table 11.B) indicate that on an average India's level and export value-share of the common items is relatively higher than that of Indonesia. Hence, India is not expected to face any significant competitive pressure from Indonesia in Sri Lanka's market.

Table 11.A: India's FKI with Indonesia in Sri Lanka					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Indonesia	0.136	0.124	0.134	0.206	0.090
Table 11.B: India's RECPI with Indonesia in Sri Lanka					
Competitor	**2018**	**2019**	**2020**	**2021**	**2022**
Indonesia	0.006	0.004	0.008	0.030	0.001
Source: CUTS calculations using TradeSift software and data WITS at HS 6-digit level					

Our findings from SMART analysis indicate that while India does not face any significant export loss, as shown in Table 12 below, there are certain products such as rubber tyres; babies' garments and accessories; cotton-made female shirts and shirt-blouses; cotton-made knitted or crocheted t-shirts, singlets and vests; woven fabrics of cotton; textile machinery; crabs; essential oils; and black tea exports, which may be relatively affected. However, the magnitude of export loss may not be significant.

Table 12: Trade Diversion likely to be experienced by India

Product Code	Description	Trade Diversion (Thousand US$)
401290	Rubber tyres	23.57
160510	Crab	17.05
844520	Textile Spinning Machines	10.51
330190	Essential Oils and resinoid	8.51
611120	Cotton knitted or crocheted babies' garments and accessories	7.74
620630	Cotton-made female shirts and shirt-blouses	6.80
090240	Black tea	6.38
520932	Woven fabrics of cotton	5.95
330130	Essential oils	5.37
610910	Cotton-made knitted or crocheted t-shirts, singlets and vests	4.58

Source: CUTS computations using WITS SMART analysis tool

Food for Thought

Being a member of SAFTA, and having a bilateral FTA with Sri Lanka, India is already accessing this market with tariff advantage in many tradable goods. While there is no doubt that this FTA will help Indonesia to boost its exports to Sri Lanka, India does not have any significant reason to fear. There is a huge gap between India and Indonesia's exports to Sri Lanka. Furthermore, our analyses based on FKI and RECPI did not find any significant number of common products between them. Also, findings from our SMART analysis confirm that there will not be any significant loss of exports.

Annexure I

Finger-Kreinin Index

The Finger-Kreinin (FK) index provides a way of measuring how similar is two sets of numbers. In principle, it can be used to compare the similarity between either the structure of a country's imports or exports with any two partner countries, to indicate how similar is a country's export pattern to its import pattern, whether geographically or by product; or to compare the structure of production in two different countries.

FKI to a Destination Country

This version of the FK Index compares export patterns of two countries into a given market (for example, UK and Japan's exports to the world or to India). Another way of thinking about this is that it compares how similar are the imports of a given country from two different suppliers. This is useful if we want to consider overall similarity of exports of two countries and therefore, their degree of competitiveness/complementarity either with respect to particular markets or with respect to their trade with the rest of world. The formula for the FK Index to a destination country is as follows:

$$FK_{i_1 i_2 j} = \sum_k \left[\left(\frac{x^k_{i_1 j}}{X_{i_i j}} \right), \left(\frac{x^k_{i_2 j}}{X_{i_2 j}} \right) \right]$$

In the FKI by destination, i_1 and i_2 are two source countries and j is a destination country. x^k refers to trade flow in product k; X as total trade flow, so x^k_{i1j}/X_{i1j} is the share of product k in country i's total exports to the destination partner (j). x^k_{i2j}/X_{i2j} is the share of product k in the comparator country's (i_2) total exports.

Relative Export Competitive Pressure Index

The Relative Export Competitive Pressure Index (RECPI) is about exploring average degree of competition country i_1 faces in country j's market from country i_2, by taking into account both the structure and level of competing countries' trade. Country i_1 will be interested in the value of country i_2's exports to country j, and also in the extent to which country i_2's exports are in direct competition with country i_1's exports. RECPI is defined for exporter i_1 with respect to competitor i_2 in market j as:

$$RECPI = \frac{\sum_k s^k_{i2j} x^k_{i_2 j}}{\sum_k s^k_{i_1 j} x^k_{i_1 j}}$$

where k refers to the product, i_1 to the reporting country, i_2 to the competitor country, and the s and x data refer to a given export destination, country j. x^k_{ij} is the value of country i's exports to country j of good k, and s^k_i gives the share of good k in country i's exports to country j.

The RECPI is a summary measure which aggregates information from across a range of sectors, subsectors or products. Hence, it can be calculated either for all trade, or for particular sectors - in all cases on the basis of more detailed sub-sectoral or product level detail.