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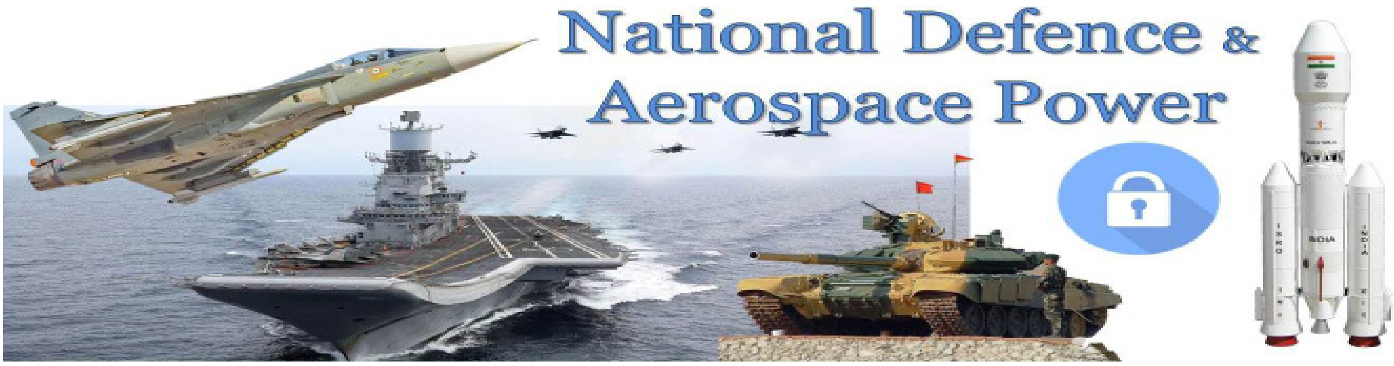

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U.S. INDO-PACIFIC ECONOMIC FRAMEWORK: CAN INDIA BECOME THE NEW TECHNOLOGY LEADER?

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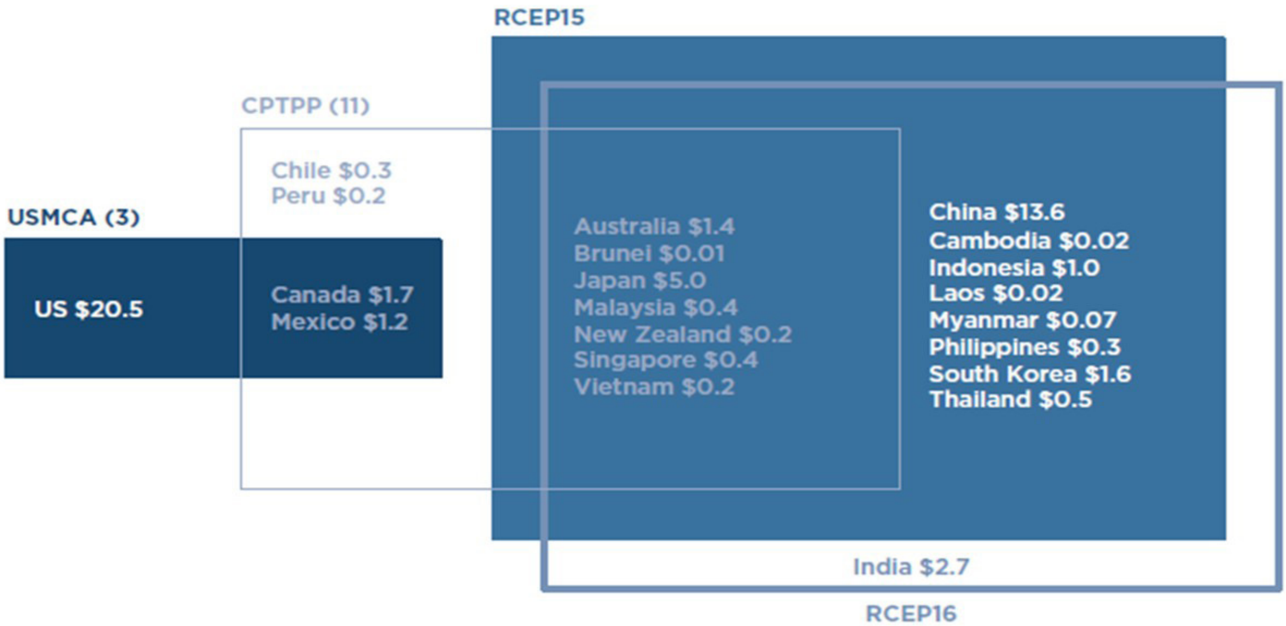
> **The IPEF is expected to salvage the US' declining economic presence in the region as China has pushed for regional economic integration through the Regional Comprehensive Economic Partnership (RCEP), linking 15 Asia-Pacific economies, which took effect on January 1, 2022.**

At the Quad summit held in Tokyo on May 24, US President Joe Biden unveiled the administration's new economic strategy for the Indo-Pacific region, the Indo-Pacific Economic Framework (IPEF) for Prosperity, which aimed to retake the economic leadership the US had enjoyed for a long time in the Asia-Pacific region. The US had been the engine of economic growth for Southeast Asian and East Asian countries through investments and market access for their regional products, but has now been taken over by China. China used the US-China trade war and the Covid pandemic to deepen its economic engagement with the Southeast Asian region. Through pandemic economic assistance and trade and investment opportunities, China helped the region to arrest the economic crisis induced by the pandemic. With the IPEF, the US aims to counter China economically, while the already established Quadrilateral Security Dialogue (Quad) comprising the democratic powers of India, Japan, Australia, and the US, could contain China strategically through the establishment of a rules-based order in the Indo-Pacific. China has criticized the IPEF for 'benefiting only a limited group of nations', while terming the Quad as an 'Asian NATO' to contain China.

Twelve countries from the Indo-Pacific region, including the United States, Japan, South Korea, India, Australia, Indonesia, Malaysia, Brunei Darussalam, Philippines, Singapore, Vietnam, Thailand, and New Zealand, joined the trade deal. They "represent 40 per cent of world GDP" and are committed to "a free, open, fair, inclusive, interconnected, resilient, secure, and prosperous Indo-Pacific region".[1] President Biden said in Tokyo, prior to the launch of the IPEF, that "We're writing the new rules for the 21st-century economy," and "are going to help all of our country's economies grow faster and fairer".[2] The US is no longer part of any regional economic agreement in the Asia-Pacific region after former President Donald Trump withdrew from the Trans-Pacific Partnership (TPP) in 2017 (Figure 1). The TPP was launched by the Obama administration to counter China's growing influence in the region. After Trump's withdrawal, Japan and the other 10 members renegotiated the agreement and formed the Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP) in 2018, and Tokyo pressured the US to join it. Instead, Washington chose to form a new deal. The IPEF is expected to salvage the US' declining economic presence in the region as China has pushed for wider regional economic integration through the Regional Comprehensive Economic Partnership (RCEP), linking 15 Asia-Pacific economies, which took effect on January 1, 2022. However, the new framework, unlike TPP and other traditional free-trade pacts, will not reduce tariffs, the most demanding element from the regional countries in the post-Covid period.

Figure 1: Regional Trade Groups Involving the United States, Asia, and the Pacific and 2018 GDP (trillions of US dollars)



CPTPP = Comprehensive and Progressive Agreement for Trans-Pacific Partnership
RCEP = Regional Comprehensive Economic Partnership
USMCA = United States-Mexico-Canada Agreement

Source: Peter A. Petri and Michael G. Plummer, "East Asia Decouples from the United States: Trade War, COVID-19, and East Asia's New Trade Blocs", Peterson Institute for International Economics Working Paper: 20/9, June 2020, https://www.piie.com/publications/working-papers/east-asia-decouples-united-states-trade-war-covid-19-and-east-asias-new Accessed on May 30, 2022.

The deal is touted as the "the most significant international economic engagement that the United States has ever had in this region", indicating the ongoing crisis in Europe would not distract the attention of the US from the strategically important Indo-Pacific region, where China is incrementally enhancing its stature as an economic and military power. The trade deal primarily focuses on four areas: Trade, Supply Chains, Clean Energy, and Tax and Anti-Corruption:

Even though China is the world's largest semiconductor market as well as exporter, it is hugely dependent on foreign sources - 2 to 80 per cent - especially on the advanced components. The critical chips needed in the semiconductor industry are mostly sourced from the US, South Korea, Japan, and Taiwan.

> "On Trade, the member countries seek to build high-standard, inclusive, free, and fair trade commitments with a broad set of objectives that fuel economic activity and investment among the member countries; Cooperation in Supply Chains aims to coordinate crisis response measures and prepare for and mitigate the effects of disruptions to better ensure business continuity and ensure access to key raw and processed materials, semiconductors, critical minerals, and clean energy technology; Cooperation in Clean Energy, Decarbonization, and Infrastructure is in line with the Paris Agreement goals and accelerate the development and deployment of clean energy technologies to decarbonize the economies and build resilience to climate impacts; and they expect the Tax and Anti-Corruption measures would promote fair competition by enacting and enforcing the effective and robust tax, anti-money laundering, and anti-bribery regimes in line with existing multilateral obligations, standards, and agreements to curb tax evasion and corruption in the Indo-Pacific region."[3]

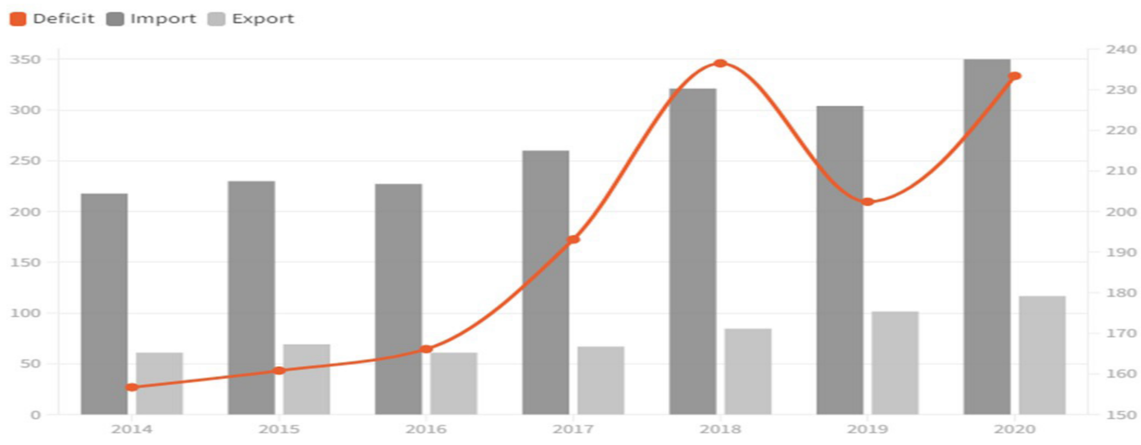
At the same time, it is not a conclusive deal that the participating countries can choose one of the four areas without having to commit to all of them. It will take 12 to 18 months to wrap up any agreements, and the formal negotiations will begin in July. Since tariff-cutting commitments are excluded from the deal due to domestic concerns in the US, the administration expects that it doesn't need the approval of Congress. The Biden administration is worried about the labour unions and environmentalists giving any concessions to foreign countries. The Trump administration has criticised previous free trade deals because they led to offshoring and the erosion of US jobs.

Background: The US-China Trade War

Since China joined the WTO in 2001, many foreign companies have set up production centres in China to leverage the low cost of production and capitalise on the rapidly growing domestic market. As a result, China became the factory of the world and a crucial player in the global supply chain of the semiconductor sector. China now wants to become a technological power in the 21st century, which was articulated in the 'Made in China (MIC) 2025' document announced in 2015 aimed at pushing for leadership in artificial intelligence, semiconductors, batteries, and electric vehicles, among other sectors.[4] China has earmarked US$ 1.6 trillion for the MIC and aims to "increase the domestic content of core technological components to 40% by 2020, and to 70% by 2025".[5] Besides, China's 14th Five-Year Plan (2021-2025) targets to "achieve high-quality development by 2035" and become "independent of technology while striving to dominate the global supply chain network".[6] China has also adopted a 'dual circulation' strategy to make China more self-reliant in major technology sectors and diversify the country's supply chains so that it can access technology and know-how without being dependent on western sources.[7] With the MIC initiative, China's output of integrated circuits surged 16.2 per cent in 2020 from 2019, industrial robot production increased from 7.2 per cent to 19.1 per cent, and new energy vehicle production expanded by 17.3 per cent in 2020 than the previous year.[8] Chinese-made semiconductors are used for producing electric vehicles, smartphones, and other consumer electronics worldwide, as well as for military applications.

The US fears that China's advancements in new generation technologies like artificial intelligence and robotics, along with China's dominance in the semiconductor industry, would challenge US leadership in technology.

Figure 2: China Semiconductor Imports vs Exports (2020) in USD Billions



Source: Wei Sheng, "China spends more importing semiconductors than oil", *Technode*, April 29, 2021, https://technode.com/2021/04/29/china-spends-more-importing-semiconductors-than-oil/. Accessed on June 20, 2022.

Even though China is the world's largest semiconductor market as well as exporter, it is hugely dependent on foreign sources - 2 to 80 per cent - especially on the advanced components. The critical chips needed in the semiconductor industry are mostly sourced from the US, South Korea, Japan, and Taiwan. In 2020, China had a trade surplus of US$ 570.4 billion, while semiconductors ran at a trade deficit of US$ 233.4 billion.[9]

It imported over US$ 300 billion worth of chips, the country's largest imported item, while domestic supply for the entire semiconductor industry was just 30 per cent (Figure 2). To reduce its dependency on foreign vendors, China's State Council in 2014 set a goal of becoming a global leader in semiconductors by 2030.[10]

The US' strategy is to constrain China from reaching its technology goal by restricting China's access to sophisticated technology and products that the US and its allies control, thus delaying China's advancements in the technology sector.

However, the US fears that China's advancements in new generation technologies like artificial intelligence and robotics, along with China's dominance in the semiconductor industry, would challenge US leadership in technology. Moreover, most of the Chinese companies in the technology sector are either state-owned enterprises or closely associated with the People's Liberation Army (PLA), as these are dual-use technologies that also have the potential for military applications. China has already made great strides in certain hi-tech military sectors, such as hypersonic vehicles, cyberspace domain, and anti-access area-denial capability. China's 'Made in China' program and the penchant for efforts to become a leader in critical technology worry the US that it will reduce China's military technology gap with the US, diminishing the US' global positioning as a superpower. On the other hand, the 2008 global financial crisis and the ensuing great recession have constrained the US' ability to launch 'sputnik moment 2' — massive investment in R&D to advance its technological capability.

To overcome this deficiency, the US' strategy is to constrain China from reaching its technology goal by restricting China's access to sophisticated technology and products that the US and its allies control, thus delaying China's advancements in the technology sector. The semiconductor industry props up China's technological leadership as well as its military modernisation. The previous US government under Trump took a series of measures to prevent Chinese tech companies from getting access to US chip technology, including an Entity List, and the Biden administration followed it up.[11] Besides, the US wants to squeeze the global supply chain related to semiconductor manufacturing in China and has pressured the European countries to stop sharing critical components with China,[12] thus attempting to form a 'techno-democratic' alliance against China's technology push.[13] One of the four (core) pillars of the IPEF is supply chain cooperation to prevent China from procuring inputs for its semiconductor industry from other sources, especially from Asian countries including Japan, South Korea, and Southeast Asia. The trade deal is to counter the economic leverage China gained in Southeast Asia during the pandemic as well as to prevent a regional supply chain management system under the Chinese leadership in the East and Southeast Asia region. With the IPEF, Washington looks to create a new supply chain network with regional allies that bypasses China.

China's Resilience and Regional Leadership

To overcome the technology disruption by the US, China introduced the 'China+1' strategy in 2018 to counter the Trump administration's trade war with China and maintain its hold over the global semiconductor supply chain as well as establish a regional supply chain ecosystem under the Chinese leadership. Through the new strategy, China diversified 'manufacturing activities' between China and the friendly countries, under which some of the companies shifted their location to Southeast Asia to focus on exporting semiconductors worldwide, while companies from China focused on catering to the domestic market.[14] As a result, countries like Thailand, Malaysia, and Vietnam attracted huge Chinese FDI during the pandemic period; Chinese companies accounted for 40 per cent of manufacturing investment in the region in 2021, up from 10 per cent only a few years ago.[15] For instance, FDI applications rose 80 per cent in Thailand year-on-year in the first quarter of 2021; Malaysia attained 383.4 per cent year-on-year growth, and Chinese investment in Vietnam covers the technology and infrastructure sector.[16] This has strengthened the supply chain integration between China and ASEAN, and Chinese investment powers ASEAN's exports to the US as well as to China. With the 'dual circulation' and 'China+1' strategy, China is seeking to achieve greater self-sufficiency in the semiconductor sector and promote the regional supply chain ecosystem, easing the pressure of the US and its allies' disruptive tactics.

The IPEF offers India a large opportunity to become a technology leader in the region, especially in two areas- semiconductor supply chains, and clean energy.

Beijing used the US-China decoupling to its advantage to strengthen its position in the region. According to a McKinsey report, "the world trade contracted by 5 per cent during the peak period of the pandemic in 2020, however, Asia's share of intraregional trade remained at around 60 per cent".[17] Similarly, the share of China's exports to ASEAN economies increased consistently, from 12 per cent in 2015 to 14.6 per cent as of the first half of 2022, while imports rose from 11 per cent to 15 per cent in the same period, making ASEAN become China's largest trading partner for the first time, overtaking the European Union in 2022.[18] Besides, China, including Hong Kong, emerged as the largest investor in manufacturing and the second largest FDI in Southeast Asia.[19] Even though China's military unilateralism generated anxiety in the region, China's acceptance of the ASEAN notion of non-interference in each other's internal affairs and favourable trade and investment opportunities boded well among the ruling elites in the region.

India and the IPEF

India's economic engagement with the Indo-Pacific countries has been through bilateral trade agreements, rather than joining a trade block because of the concerns about tariffs and cheap imports that would threaten the competitiveness of local producers. However, the IPEF offers India a large opportunity to become a technology leader in the region, especially in two areas- semiconductor supply chains, and clean energy. Since IPEF does not mention tariff reduction, its main focus is on high-tech sectors, in which India has already taken some measures. In his address, last November at the COP26 climate summit in London, Prime Minister Modi pledged India's commitment to achieving 'net zero emissions by 2070',[20] and few leading Indian companies have promulgated billions of dollars of investment in developing clean energy technologies.[21] By aligning with the IPEF's clean energy push, India can become a champion in clean energy technology in the Indo-Pacific region.

Similarly, India can become an alternative source in the semiconductor supply chain ecosystem. The Quad framework can be applied in the supply chain network that US technology, Japanese capital, Australia's logistics, and Indian production could fill the vacuum created by the marginalisation of China. Without an alternative source of market for Southeast Asia, a China-Southeast Asia decoupling is unlikely to take place, while India can be the destination for new investment in the semiconductor sector. In a way, the Quad can work in tandem with the IPEF and India can be the main pillar of both.

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