

## Global Economic Viewpoint

## Friendshoring, or rerouting, that is the question

### Does a higher share in US imports make you a winner?

Trade tensions between the US and China mean that global supply chains are continuing to shift from focusing on efficiency to managing geopolitical risk. Friend/nearshoring is now the topic on everyone's minds, along with the potential risk of some countries rerouting Chinese exports. The share of Vietnam, Mexico, Taiwan, Korea, India and Thailand in US imports jointly has increased by 8.1 p.p. since 2018.

### Only a true relocation should lead to higher productivity

For investors, it is key to identify winners and losers. While a true relocation of production resulting from friend/nearshoring should lead to increased foreign direct investment, productivity, GDP growth, and real exchange rate appreciation, rerouting will likely have a much smaller impact on such variables. In fact, we believe investors should be cautious, as rerouting behavior could risk triggering retaliatory tariffs by the US, leading to a weaker, or at least more volatile, exchange rate amid higher risk premium.

### Are China's exports being rerouted?

For EM, many interpret increasing market shares in US imports as evidence of friend/nearshoring. However, most of the winners in this category have also seen the largest increase in their share in China's exports. One hypothesis could be that Chinese exports are simply being rerouted to the US through other countries to bypass trade restrictions. We search for clues in bilateral trade data with both the US and China.

### Mexico: the nearshoring darling

We would disagree with the premise that the increase in Mexico's exports to the US is due to rerouting. In fact, exports to the US have increased by 5% of GDP, outgrowing imports from China by 3% of GDP. This indicates to us that nearshoring seems to explain most of Mexico's gain. It's true that Mexico is importing more from China in dollar terms, but that is in large part explained by Mexico's growth.

### Vietnam: the strongest case for rerouting

Since 2018, Vietnam's exports to the US have grown by about 13% of GDP. While this seems much larger than Mexico's gain, exports to the US have outgrown imports from China by the same 3% of GDP. In our view, with about 70% of Vietnam's gain offset by higher imports from China, this might indicate rerouting of Chinese products to the US.

### Mixed picture in the rest of EM Asia

Other countries in Emerging Asia could also be candidates for friendshoring (or rerouting). Looking at the same bilateral trade data, we believe Taiwan could be benefitting from friendshoring. The picture is less clear for Korea and India, while we think there may be some evidence of rerouting in Thailand.

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# Friendshoring, or rerouting, that is the question

### Friendshoring is a hot topic: what about rerouting?

Geopolitical risks continue to influence trade relations, especially between the US and China. Evidence of this tension really came to the fore during the Trump administration, but has been building ever since. The imposition of US tariffs on Chinese imports in 2018, and restrictions on strategic sectors by more recent legislation (see our report, Geopolitics are here to stay), are perhaps the clearest examples of US-China friction.

### The approach to global supply chains is shifting

Against this backdrop, global supply chains are gradually shifting their approach from one based on efficiency to one increasingly based on geopolitical risk management. As a result, the alternative strategies of reshoring, friendshoring, and nearshoring have become a hot topic for debate.

### Let's get the definitions out of the way: the different types of 'shoring'

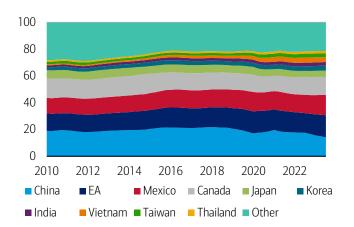
All these 'shoring' terms are cousins. 'Reshoring' denotes bringing back production to the 'home' country – in this case, the US – where goods are sold/consumed. Friendshoring implies shifting production to where relations are warmer with the 'home' country, while 'nearshoring' refers to those countries that are also geographically closer.

### Where are we seeing friendshoring and rerouting?

Mexico, Vietnam, Taiwan, India and Thailand among others have seen exports to the US increase. Some argue that this is a direct consequence of friend/nearshoring. Others, though, have started to question whether these gains may instead be the result of Chinese exports being rerouted to the US through other countries to bypass trade restrictions. We argue that not all countries are the same: while some appear to be benefitting from friendshoring, others can be seen as rerouting suspects.

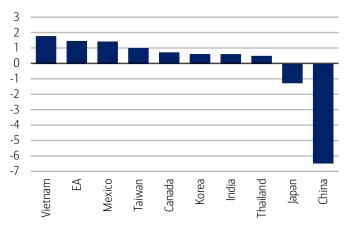
By looking at aggregate bilateral trade data, we would disagree with the premise that the increase in Mexico's exports to the US is due to rerouting. However, with about 70% of Vietnam's new exports to the US offset by higher imports from China, we believe the country must be rerouting Chinese products to the US. Our evidence shows that Taiwan may also be benefitting from friendshoring, while it appears inconclusive for Korea and India. Lastly, it seems possible that some rerouting may be happening in Thailand.

**Exhibit 1: Composition of US imports**China's share in US imports has been declining since 2018



Source: BofA Global Research, Haver
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**Exhibit 2: Changes in market share in US imports since 2018** Vietnam, Mexico, Taiwan, Korea, India, Thailand gained share vs China



Source: BofA Global Research, Haver

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### Friendshoring/rerouting may have different effects on productivity, asset prices

Figuring out the fundamental drivers in external accounts can be key for macro variables and asset prices. While a true shift in production (friend/nearshoring) should be associated with a rise in investment, productivity and, subsequently, a sustained real exchange rate appreciation, a case for rerouting should have a much lesser impact on these variables. In fact, rerouting behavior could risk triggering retaliatory tariffs by the US, which may even lead to a weaker, or at least more volatile, exchange rate.

### Where is the US importing from?

One way to evaluate nearshoring at face value is to focus on US imports. When a country's share of US imports increases (or decreases), we could attribute this to friendshoring. Exhibit 1 shows the share of select countries in US imports over time.

Clearly, China is the most prominent case in terms of a declining market share in US imports. It has been losing share since Trump imposed tariffs on Chinese products. Biden then followed with subsidies to bring back the production of goods, such as semiconductors, to the US.

In contrast, other countries have seen their share in US imports increase. Exhibit 2 shows the winners and losers in terms of market share of US imports. Vietnam, the Euro area, Mexico, Taiwan, Canada, Korea, India and Thailand are the countries whose market share in US imports has increased the most.

Since the US imposed tariffs on China in 2018, these countries' market share in US imports has jointly increased by 8.1 percentage points. Meanwhile, China's has decreased by 6.5 percentage points, offsetting most of the winners' gains.

Of course, a country hit by tariffs or affected by other types of trade barrier, like China, could look for ways to circumvent such barriers. It could engage in rerouting exports through other countries, with the US still the final destination.

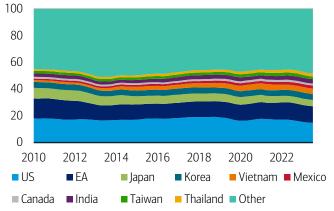
### China's exports point to the same countries

In the same way we look at the composition of US imports, we can analyze Chinese exports. If China's share in US imports has been declining for several years, presumably it must be looking for alternative export markets.

Exhibit 3 shows China's share of exports to the same set of countries as above, with a shift away from the US to other countries, many of which are those that gained the most share of US imports over the same period (Exhibit 4).

Exhibit 3: Composition of China exports

The US' share in China exports has been declining since 2018

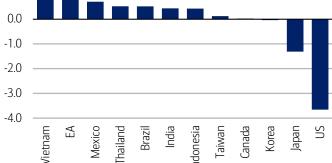


Source: BofA Global Research, Haver

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**Exhibit 4: Changes in market share in China exports since 2018**Away from the US and into Vietnam, Mexico, Thailand, among others





Source: BofA Global Research, Haver

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### Exhibit 5: China bilateral trade balance (% of GDP)

China's trade surplus with the US has been shrinking since the GFC



### Exhibit 6: China exports to rerouting suspects (% of GDP)

Chinese exports have shifted away from the US



Vietnam, Mexico, Thailand, and India, among others, now buy a larger share of Chinese exports, which could raise concerns about the extent of genuine trade reallocation vs bypassing trade barriers.

### Houston, do we have a (rerouting) problem?

We are interested in countries that have gained most market share in US imports. We focus on emerging markets, which are likely to be the closest substitute for China in the global supply chain. This reduces our main scope to Vietnam, Mexico, Taiwan, Korea, India and Thailand (Exhibit 2). Of these, to identify if some of those countries that may be rerouting, we narrow the sample further to those that are importing a larger share of China's exports: Vietnam, Mexico, Taiwan, India, and Thailand (Exhibit 4).

#### China's bilateral trade balance may give a hint

Before we examine each country individually, we look at China's bilateral trade. We focus on variables as a share of GDP, to broadly control for nominal growth. From China's perspective, we would expect an increase in exports to a certain country, driven by the sole purpose of rerouting exports, to translate into a larger bilateral trade surplus with the rerouting country (compensating the smaller trade surplus with the US).

China's lower bilateral trade surplus with the US would not be (fully) compensated in the case of a country experiencing friendshoring. In such case, besides an uptick driven by domestic growth, we would expect imports from China to be flatter.

Looking at China's bilateral trade balance with India, Indonesia, Mexico, Thailand, Vietnam and the US (Exhibit 5), we highlight that China's trade surplus with the US has been shrinking since the Global Financial Crisis (GFC). Meanwhile, its trade surplus with Thailand and Vietnam had been increasing for years before the pandemic. By contrast, China's surplus with India and Mexico had been stagnant until the pandemic struck.

Except for the US, Chinese exports have increased to each of the countries outlined (Exhibit 6). Chinese exports to Thailand and Vietnam have been increasing since around the same time that US-China trade tensions started to intensify. In contrast, most of the uptick in exports to India and Mexico took place only after the onset of the pandemic.

#### After the big picture, we focus on specific countries

We measure the extent to which trade patterns may be reflecting friend/nearshoring, and whether rerouting from China may be behind some of the winners' success in gaining share in US imports. We will focus on aggregate bilateral trade data, its evolution, and whether trade patterns show an increased correlation or elasticity between each country's exports to the US relative to its imports from China.



### Mexico: the nearshoring darling

If large-scale rerouting of Chinese exports to the US were taking place via some specific country, we would expect an uptick in (gross) exports to the US, aligned with a similar-sized uptick in (gross) imports from China. Absent transaction costs, rerouting is like a layover at an airport, it is the same product making one more stop.

### Mexico has gained market share in US imports

China has been losing market share in US imports since Trump imposed tariffs on its products and Biden followed with subsidies to bring the production of goods, such as semiconductors and electric vehicles, back to the US (Exhibit 1, Exhibit 2). This has allowed Mexico to surpass China as the largest US trade partner, which we see as evidence of nearshoring (see our report, Where can you see nearshoring in the macro data?).

### But Mexico has also been importing more from China

Mexico's imports from China have grown significantly since US-China trade tensions began. In fact, Mexico is receiving a larger share of Chinese exports than ever before (Exhibit 4). Could it then be that Mexico is just importing more from China, and exporting that to the US without any change to the products in the process?

#### Mexican exports to the US have grown above and beyond imports from China

A look at Mexican exports to the US and Mexican imports from China speaks for itself (Exhibit 7). Mexican imports from China were stagnant as a share of GDP from 2016 until 2021. After a brief uptick during the post-pandemic recovery, they remain around 6% of GDP. Mexico is importing more from China in dollar terms, but that is in large part explained by Mexico's growth. Indeed, Mexico has been importing more cars from China for local consumption.

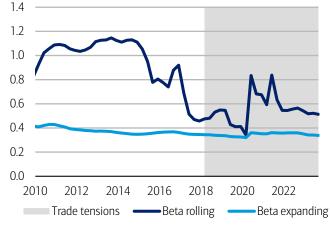
In contrast, Mexican exports to the US have been increasing since around 2015, although with some volatility, after stagnating since the early 2000s. At their peak, they reached 33% of GDP, compared to about 27% in 2017, even though they have recently declined (largely explained by the Super Peso).

In our view, these results are consistent with Mexico doing something other than just importing more products from China and shipping them without change to the US. In other words, the figures are more consistent with a friend/nearshoring than with rerouting (see our report, <u>Is Mexico rerouting from China?</u>). In our view, there is no evidence of China rerouting goods to the US via Mexico.

**Exhibit 7: Mexico exports to US and imports from China (% of GDP)**3pp of the additional 5pp of exports can be attributed to nearshoring



**Exhibit 8: Elasticity of Mexico exports to US vs imports from China** Exports to the US have not become more correlated to imports from China



Source: BofA Global Research, Haver

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On the contrary, Mexico's gain in market share in US imports is for real. If we look at the difference between exports to the US and imports from China, and compare this to the same measure in 2018, the result is the yellow area in Exhibit 7. Since trade tensions began, nearshoring may have brought up to 3% of Mexico's GDP in additional net exports, about 60% of the increase in gross exports to the US of about 5% of GDP.

### A rolling beta approach confirms the same findings

To check the robustness of our results, we run a linear regression of the quarterly log changes of exports to the US and imports from China and compute the elasticity using both a six-year rolling sample and an expanding sample starting in 1996. Such a simple exercise does not incorporate many relevant macro drivers, though growth should be broadly accounted for, assuming both exports and imports are similarly impacted. While imperfect, the results may still guide our understanding of the evolution of the sensitivity of exports to the US relative to changes in imports from China.

Under a rerouting hypothesis, we would expect an increase in the elasticity since the escalation of trade tensions. However, for Mexico, Exhibit 8 shows that such elasticity is, if anything, lower than it used to be and nowhere near its peak. There is no evidence that exports to the US are more synchronized with imports from China than before. If anything, we believe the lower elasticity is another sign that Mexico is importing more from China for its own consumption, as is happening in the auto sector.

#### Local content clauses in USMCA should remain a barrier to rerouting

This may or may not be surprising. A *priori*, the free trade agreement between the US, Mexico, and Canada (USMCA), makes Mexico stand out as a good prospect to reroute to the US. However, benefitting from the advantages of free trade agreements is not a trivial task.

There are clauses in such agreements that are specifically designed to prevent this type of behavior. In fact, the USMCA encompasses regulations on local content to benefit from a tariff exemption. As a result, rerouting through Mexico is likely a much less attractive option *ex-post*, more so if it could give rise to retaliation and eventual weakness or volatility in the exchange rate because of heightened risk premia.

### Vietnam: the strongest case for rerouting

In the same way that proximity to the destination makes a location attractive for friendshoring or for rerouting trade, the same is true about proximity to the origin. Given its geographical proximity to China, and the similarities across Emerging Markets, we focus on Emerging Asia.

### Vietnam has seen the largest increase in its share in US imports

As we have shown, Vietnam has seen a larger increase in its share of US imports than any other country (Exhibit 1). This is also confirmed by impressive growth in exports to the US.

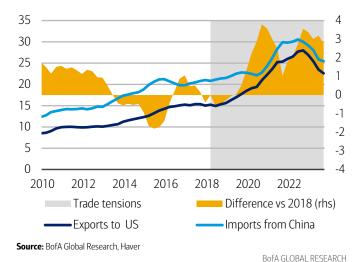
Vietnamese exports to the US (as a share of Vietnam's GDP) had been increasing to some extent before US-China trade tensions reached a peak, when the Trump Administration imposed tariffs on Chinese products in 2018. However, exports to the US have been growing much faster since 2018, which could be attributed to US-China trade tensions (Exhibit 9).

#### But it has also gained the most share in Chinese exports

Digging deeper, however, we note equally impressive growth in Vietnam's imports from China. The latter grew faster than Vietnam's exports to the US before 2015. However, since 2018, both have followed each other more closely and grown at a similar pace, peaking at around 30% of GDP in 2022 (Exhibit 9).



## **Exhibit 9: Vietnam exports to US, imports from China (% of GDP)** Out of 13% new exports, 70% of these may be explained by rerouting



## **Exhibit 10: Elasticity of Vietnam exp to US vs imp from China** Exports to the US have become more correlated to imports from China

1.0 0.8 0.6 0.4 0.2 0.0 2016 2018 2020 2022

Beta rolling

Trade tensions

Source: BofA Global Research, Haver

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Beta expanding

### Rerouting may explain most of the increase in Vietnam's share in US imports

On net, exports to the US have grown a lot less than at face value. Vietnam's exports to the US have increased by up to 13% of GDP since 2018, while its imports from China have in turn risen by about 7% of GDP (Exhibit 9). In our view, with about 70% of Vietnam's gain offset by higher imports from China, this might indicate rerouting of Chinese products to the US.

One potential caveat of our approach is that an initial phase of friendshoring could be characterized by high investment, which could be import-intensive. In this case, part of the uptick in Vietnam's imports from China could be due to investment. However, it is hard to believe rerouting is not taking place at least up to some extent.

#### As shown by the increased elasticity of exports to US vs imports from China

Our rolling elasticity approach further supports our findings. After being roughly stable for several years, the elasticity of Vietnam's exports to the US to imports from China has increased significantly, and now appears more than 4x what it used to be.

Even if we attributed part of this increase in the elasticity of exports to the US relative to imports from China to some pandemic-related dynamics, the magnitude of these differences makes a strong case for rerouting, in our view.

#### Vietnam is deeply integrated with Chinese production

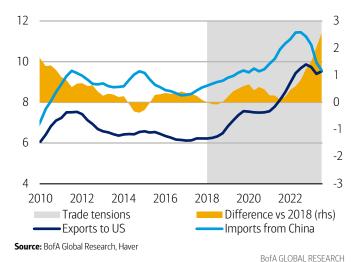
As we have noted in the past, Vietnam is deeply integrated with the Chinese production network in the upstream (see our report, <u>China Economic Watch</u>). China supplies more than 60% of Vietnam's imports of fabrics and yarn, which is used for manufacturing of textiles and garments. For electronics and machinery, as Vietnam specializes in the downstream part of production, it still relies on the supplies of parts and components from China.

### Going forward, Vietnam should focus on quality rather than quantity

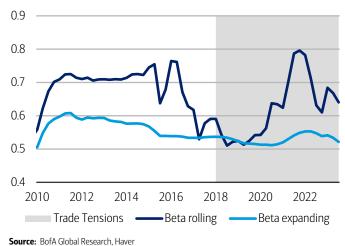
Quality, rather than quantity of FDI, matters more for Vietnam in the next stage of its transformation. A large part of FDI remains in lower-end activities (e.g. assembly), which may be partly related to rerouting. At the same time, local enterprises remain largely unlinked with global supply chains. Higher-quality FDI will be crucial in moving Vietnam up the global value chain. Together with policies to better facilitate technology transfer, this will help raise local enterprises' participation in global supply chains and support Vietnam's ambition to be an upper middle-income economy.



## **Exhibit 11: Taiwan exports to US, imports from China (% of GDP)** Taiwan seems to be reaping the fruits of friendshoring



## **Exhibit 12: Elasticity of Taiwan exports to US vs imports from China** Exports to the US have not become more correlated to imports from China



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### What about the rest of Emerging Asia?

Following Vietnam and Mexico, the countries that have seen their share in US imports increase the most since 2018 have been Taiwan, Korea, India and Thailand. We examine these one by one under the same lens.

### Taiwan: reaping the fruits of friendshoring

While Taiwanese exports to the US and imports from China are evidently correlated, the former have grown much faster than the latter (Exhibit 11). While exports to the US rose by close to 4% of GDP at their peak, imports from China have shown a more meagre 1% of GDP increase (except for what looks like a brief transitory peak during the pandemic). On net, three-quarters of new Taiwanese exports to the US have translated into additional net exports. Like Mexico, Taiwan seems to be reaping the fruits of friendshoring, especially over the past few years.

Looking at the rolling elasticity of exports to the US vs imports from China delivers a similar message. Besides a brief peak during the pandemic, Taiwan's exports to the US do not seem more correlated than in the past with its imports from China (Exhibit 12).

In our view, this is indicative that Taiwan is not simply rerouting Chinese goods to the US. During the pandemic, for instance, Taiwanese tech exports were especially strong. And while Taiwan also imported more components from China, the correlation between the two was still in line with its historical norm (Exhibit 12).

#### Korea: stagnant net exports but less clear conclusions

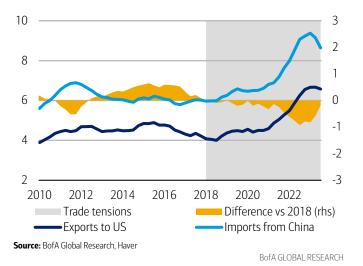
Contrary to what may have been expected, the sharp increase in Korea's exports to the US has been roughly counterbalanced by a similarly sharp rise in imports from China. Today, the difference between how much Korea exports to the US and how much it imports from China are at similar levels as in 2018 (Exhibit 13). This lack of improvement in net exports may raise some concerns about the extent to which Korea may be rerouting Chinese exports to the US.

That said, we believe cyclical factors have been clouding the actual picture. The improvement in exports to the US since 2018 has been mostly driven by semi and electronics upturn, followed by the higher demand of Korea autos from 2022. Meanwhile, the increase in China exports to Korea was mostly due to the expansion of Korea's EV supply chain, where more chemicals and raw materials have been imported since 2022. In fact, the rolling elasticity of exports to the US relative to imports from China does not seem to have moved in a clear direction in recent years (Exhibit 14).



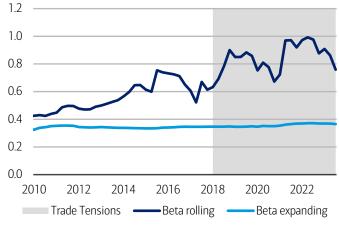
### Exhibit 13: Korea exports to US and imports from China

The growth in exports to the US seems offset by higher imports from China



### Exhibit 14: Elasticity of Korea exports to US vs imports from China

No clear shifts in the sensitivity of exports to US vs imports from China



#### Source: BofA Global Research, Haver

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#### India: any net gains seem to be driven by the base year

In India, the data shows that since 2018, exports to the US have outgrown imports from China by about 2% of GDP (Exhibit 15). This could point to India benefitting from friendshoring. However, a more careful look at the data shows that in our base year (2018), imports from China were abnormally low relative to exports to the US, as can be seen in the yellow shaded area in Exhibit 15, which also increases going back from 2018.

On net, then, India does not seem to be materially benefitting from nearshoring so far. That said, however, imports to the US do not seem to have become materially more sensitive to imports from China than in the past (Exhibit 16). As a result, we do not think it likely that rerouting is taking place either. However, as noted before, India is a strong contender for the diversification of supply chains (see our report, Supply Chain diversification- rising to the occasion).

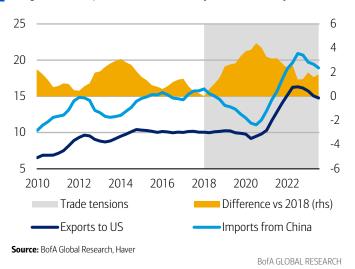
### Thailand: some indication of rerouting, but not crystal clear

In Thailand, there seem to be some unusual patterns in the data. Between 2010 and around 2016, imports from China grew at a much faster pace than exports to the US. After that period, both series stagnated until around the pandemic.

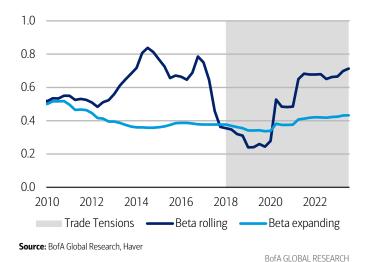


## Exhibit 15: India exports to US and imports from China (% of GDP)

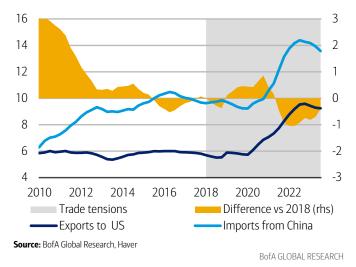
The gains in net exports seem to be driven by an unusual base year



## **Exhibit 16: Elasticity of India exports to US vs imports from China** Exports to the US do not seem more correlated with imports from China

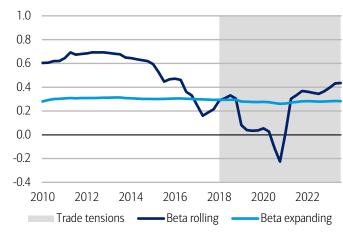


## **Exhibit 17: Thailand exports to US and imports from China** As share of GDP (%)



### Exhibit 18: Thailand exports to US vs imports from China

Exports to the US have not become more correlated to imports from China



Source: BofA Global Research, Haver

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Since then, however, there has been an abrupt pickup in both exports to the US and imports from China (Exhibit 17). On net, in fact, imports from China have outgrown exports to the US. In addition, while imports from China were growing much faster than exports to the US, both were more correlated than in recent years.

However, it is also true that, most recently, there has been a significant uptick in the sensitivity of exports to the US relative to imports from China (Exhibit 18). In our view, these trade patterns may be somewhat indicative of rerouting. At least, Thailand does not seem to be benefitting from friendshoring.

Furthermore, while overall data do not show a significant uptick in the correlation between imports from China and exports to the US, there are some signs of rerouting from China, especially in solar PV exports and some electronic products. Many Chinese businesses moved to Thailand to gain access to the US market after US tariffs were imposed in 2018.

Additionally, we are starting to see a rising share of Chinese goods penetrating domestic demand, as Chinese exports to the US fell. This could explain why imports from China



recently grew at a much faster pace than exports to the US. Recent inflows of FDI also seem to indicate that some of the investment inflows, especially from China, prioritize domestic demand before exports.

### Opportunities will remain, focus on who grabs them

We believe the approach to global supply chains will continue to shift from one focused on efficiency gains tow to one based on geopolitical risk management. As a result, reshoring, friendshoring and nearshoring appear here to stay, offering attractive opportunities to Emerging Markets.

For investors, it is key to identify winners and losers. While a true relocation of production resulting from friend- or near-shoring should lead to increased foreign direct investment, productivity, GDP growth, and real exchange rate appreciation, rerouting should have a much smaller impact on such variables. In fact, we believe investors should be cautious, as rerouting behavior could risk triggering retaliatory tariffs by the US, leading to a weaker, or at least more volatile, exchange rate amid higher risk premium.

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