Photo by Karthik Rai
Kearney, Chicago

Made in America: Here to stay?

KEARNEY

Executive summary

This year, Kearney's 2024 Reshoring Index (KRI) report focuses on whether the notion of "Made in America, for America" will prove to be a Presidential election year bumper sticker or a description of industrial manufacturing in the Western Hemisphere for the foreseeable future.[1]

Our money is on the former.

This year's KRI report closely examines a US market increasingly reliant on goods made closer to home, driven by continuing movement reflecting trends set in motion over the past few years. The KRI ramped up significantly in 2023 as the ratio of Asian low-cost countries and regions (LCCRs) imports into the United States over domestic manufacturing gross output (MGO) declined.

Among this year's key findings are:

— US imports from 14 Asian LCCRs declining by $143 billion, from $1,022 billion in 2022 to $878 billion in 2023 while domestic MGO stayed essentially flat, marginally declining from $7.245 trillion in 2022 to $7.236 trillion in 2023.

— The majority of the drop in Asian LCCR imports was caused by a staggering 20 percent (or $105 billion) reduction in Chinese imports.

— Interestingly, for the first time since 2013, Asian LCCRs other than mainland China, and particularly "winners" from the past four years, also saw a dip in imports. Vietnam and Malaysia saw their exports to the United States shrink by about 10 percent and 16 percent respectively. India, Thailand, and Taiwan were able to limit the damage and their imports to the US stayed relatively flat.

— Total imports from Canada have steadily increased over the past three years. Since the COVID-19 pandemic, Canadian imports have kept pace with Asian LCCR imports. In 2023, Canada saw its exports to the US increase across half of their categories, the largest being transportation equipment, which showed a 30 percent increase.

— Last year for the first time since our 2013 inaugural Reshoring Index, Mexico surpassed mainland China and is now the largest exporter to the United States. US imports of Mexican manufacturing goods grew from $320 billion to $422 billion (32 percent), an increase of $102 billion since the pre-COVID days.

— The US may not be importing as much as it has from mainland China but that doesn't mean Chinese businesses are standing still. In fact, nothing could be further from the truth. Chinese companies are still very much in the US import game (see sidebar: Chinese exporters focus on the future on page 7).

— We're seeing a correlation emerging between increasing US imports from Asian LCCRs, excluding mainland China, and the imports these countries have from mainland China. For example, there was a 75 percent increase in Vietnam's imports from mainland China in 2022 when compared to 2018, and Vietnam has been one of the biggest winners in the global reshuffle of US-bound exports over that same time period.

— Chinese exports to other US importers have been increasing steadily and mainland China is now running trade surpluses with countries such as Vietnam, India, and Thailand, which in turn are running widening surpluses with the United States.[2]

— But US companies and consumers are starting to truly "buy American," as shown by our US self-sufficiency index, which gradually declined from 2013 to 2020 but started flipping modestly in 2021 and increased by 5 percent between 2022 and 2023.

— US investments remain strong but, while receiving considerable support from both the private and public sector, US domestic manufacturing still faces considerable hurdles, including a severe lack of skilled workers, labor costs, and infrastructure challenges.

However, based on this year's report, we believe the commercial sector's "smart money" will still be betting on expanded re- and nearshoring for the foreseeable future.

[1] KRI is the year-over-year change in the US manufacturing import ratio (MIR) (basis points, 2013–2023). MIR is the total manufactured goods imported from 14 Asian LCCRs as % of domestic output. To calculate the Kearney Reshoring Index, we look at the import of manufactured goods from the 14 Asian LCCRs—mainland China, Taiwan, Malaysia, India, Vietnam, Thailand, Indonesia, Singapore, Philippines, Bangladesh, Pakistan, Hong Kong, Sri Lanka, and Cambodia—and the US domestic gross output of manufactured goods. To calculate the manufacturing import ratio (MIR), we divide the import of manufactured goods from the 14 LCCRs by US domestic gross output. The US Kearney Reshoring Index reflects the year-over-year change in the MIR, with a positive number indicating net reshoring and a negative number indicating net offshoring. The precise calculation is 2022 MIR 14.10 percent – 2023 MIR 12.14 percent = 1.96 percent x 100 = 196.

[2] Others include Mexico, Canada, Vietnam, Taiwan, India, Ireland, Germany, Japan, and South Korea.

Reshoring Index at its highest in more than a decade

With the November US Presidential election drawing closer, "Made in America, for America" sounds like another political slogan. But in the world of international commerce, it's a growing trend negatively impacting Asian markets long dependent on America's robust import market.

The real question is, "Can it last?"

One fact is beyond question. The US market increasingly relies on goods made closer to home. Kearney's 2024 Reshoring Index (KRI) continues to see shifts reflecting trends set in motion over the past few years. The KRI ramped up significantly in 2023 as US imports from 14 Asian low-cost countries and regions (LCCRs) declined by $143 billion, from $1,022 billion in 2022 to $878 billion in 2023. Domestic manufacturing gross output (MGO) stayed essentially flat, marginally declining from $7.245 trillion in 2022 to $7.236 trillion in 2023.

As shown in figure 1, this year's manufacturing import ratio (MIR) reached 12.14 percent.[3] This is on par with 2019, but lower than any other prior year since 2014.

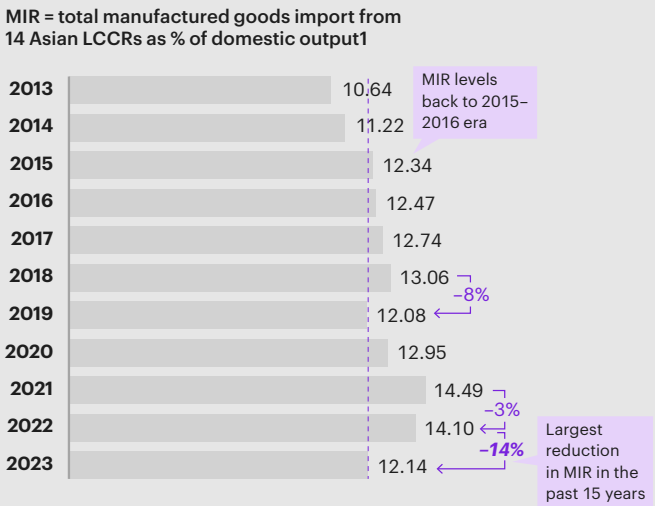
As a result, as illustrated in figure 1, the KRI stands at 196 basis points, reflecting the increase of 157 basis points in the MIR vs. 2022, the highest increase since we started tracking this metric.

The decline in Asian LCCR imports was in line with an overall US imports dip of $113 billion in 2023 compared to 2022, from $2.786 trillion to $2.673 trillion (see figure 2 on page 3). Much of this dip traces back to destocking, or consumption of inventory accumulated over the past few years. This can be seen in the changes in ISM's Manufacturer's Inventories Index (MII), which declined by about 15 percent from 2022 to 2023.[4] In 2022 the annual average of the MII was 53.8 compared to 45.6 in 2023.

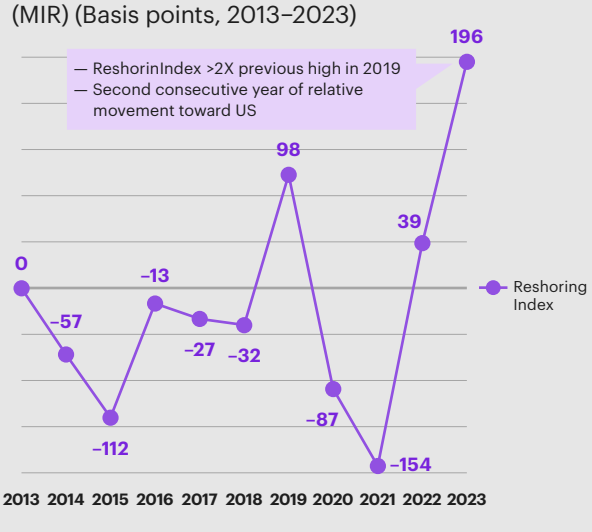
[3] MIR is the total manufactured goods import from 14 Asian LCCRs as % of domestic output.
[4] The Index, based on surveys of purchasing and supply executives, measures whether companies' inventories are increasing, decreasing, or staying the same. The Index value reflects manufacturing sector sentiments and conditions with respect to inventory levels. An Index value above 50 indicates that inventories are expanding. A value below 50 signifies they are contracting and a value of 50 indicates no change.

Figure 1
The Reshoring Index reflects an increase of 157 basis points in MIR, the largest jump since Kearney started tracking the metric

US manufacturing import ratio (MIR) (2013–2023)



Year-over-year change in the US manufacturing import ratio (MIR) (Basis points, 2013–2023)



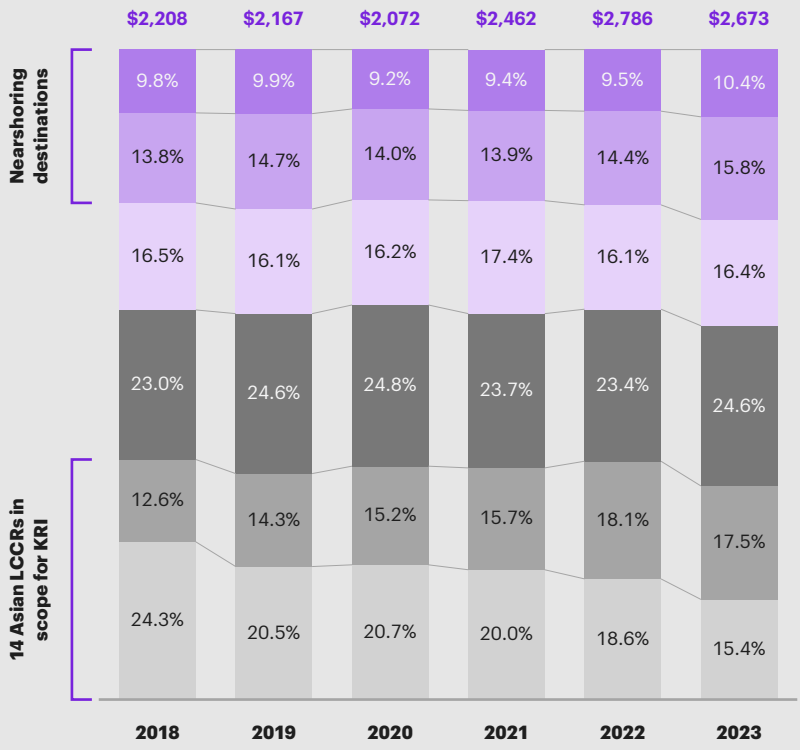
[1] 14 Asian LCCRs—low-cost countries and regions—including mainland China, Vietnam, India, Philippines, Malaysia, Indonesia, Pakistan, Sri Lanka, Taiwan, Thailand, Bangladesh, Singapore, Hong Kong, Cambodia

Sources: United States International Trade Commission, United States Department of Commerce Bureau of Economic Analysis; Kearney analysis

Figure 2

Overall, US imports dropped by $113 billion, with mainland China's imports decreasing by $105 billion and other Asian LCCRs by $38 billion

Country of origin mix of manufactured goods imported into the US
(2018–2023, $ billion)



- Mainland China
- Other 13 Asian LCCRs[1]
- Europe
- Other countries[2]
- Mexico
- Canada

[1] Other 13 Asian LCCRs includes Vietnam, Philippines, Malaysia, Indonesia, Pakistan, Sri Lanka, Taiwan, Thailand, Bangladesh, India, Singapore, Hong Kong, Cambodia.

[2] Other countries include 165 countries.

Note: LCCR is low-cost countries and regions.

Sources: Unites States International Trade Commission; Kearney analysis

There were additional forces at work as well. The majority of the drop in Asian LCCR imports was caused by a whopping 20 percent (or $105 billion) reduction in Chinese imports. Chinese imports of computers and electronics fell by $30 billion (19 percent). Chemicals were down $14 billion (40 percent), miscellaneous manufactured commodities slipped by $12 billion (20 percent), and apparel, as well as electrical equipment, appliances, and components, each fell by $5 billion (23 percent and 9 percent respectively).

Mainland China's share of the 14 Asian LCCRs imports factored into our RI calculation has steadily declined since tariffs were first introduced in 2018 (see figure 3 on page 4). It hit a new low of 46 percent by Q4 of 2023. Even more telling is the fact that mainland China's imports, measured in absolute dollar terms, have fallen below 2013 (when we first started tracking) and 2020 (COVID) levels.

Interestingly, for the first time since 2013, Asian LCCRs other than mainland China, and particularly "winners" from the past four years, also saw a dip in imports. Vietnam and Malaysia saw their exports to the United States shrink by about 10 percent and 16 percent respectively. India, Thailand, and Taiwan were able to limit the damage and their imports to the US stayed relatively flat.

In the United States, our annual KRI survey of CEO attitudes (completed this year) about re- and nearshoring trends found executives continue to be encouraged to consider re- and nearshoring by a variety of their stakeholders (see figure 4 on page 4). The only advocacy stakeholder group showing a decline over the past few years is "family and friends."

With that in mind, it's likely that the trend away from Asian LCCRs will continue. In fact, while 38 percent of the manufacturing executives responding to the KRI survey are looking to continue to re- or nearshore operations from mainland China, another 25 percent are discussing moving operations away from India, and 14 percent are thinking about exiting Vietnam in favor of locations closer to the US market.

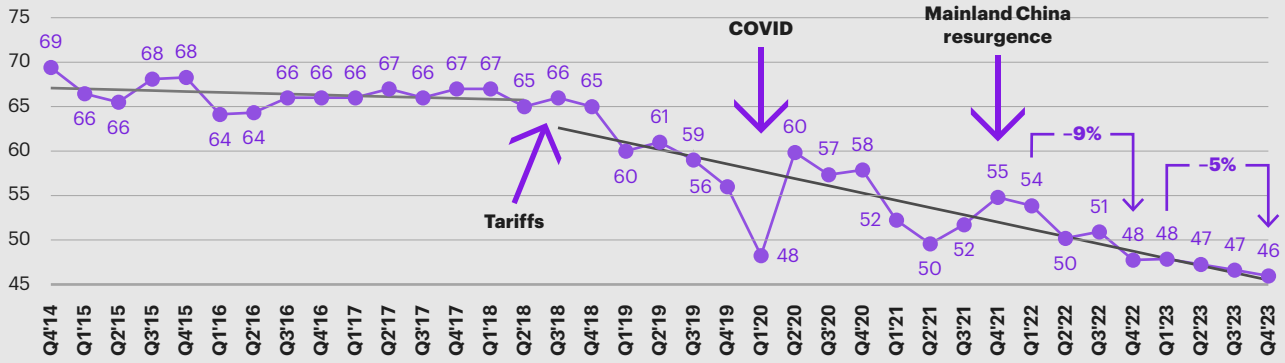
So, are most of those imported goods that used to come from our 14 Asian LCCRs now really being made closer to the US domestic market, as the deluge of supply chain articles about reshoring and nearshoring would indicate?

Closer, yes, but not totally reshored.

Figure 3

Mainland China's share of 14 Asian LCCRs imports had already started to decline long before COVID

Kearney CDI: seasonally adjusted share of US LCCR import value from mainland China[1]
(% 2014 Q4 – 2023 Q4)



[1] Includes US imports from Hong Kong

Note: CDI is China Diversification Index. LCCR is low-cost countries and regions.

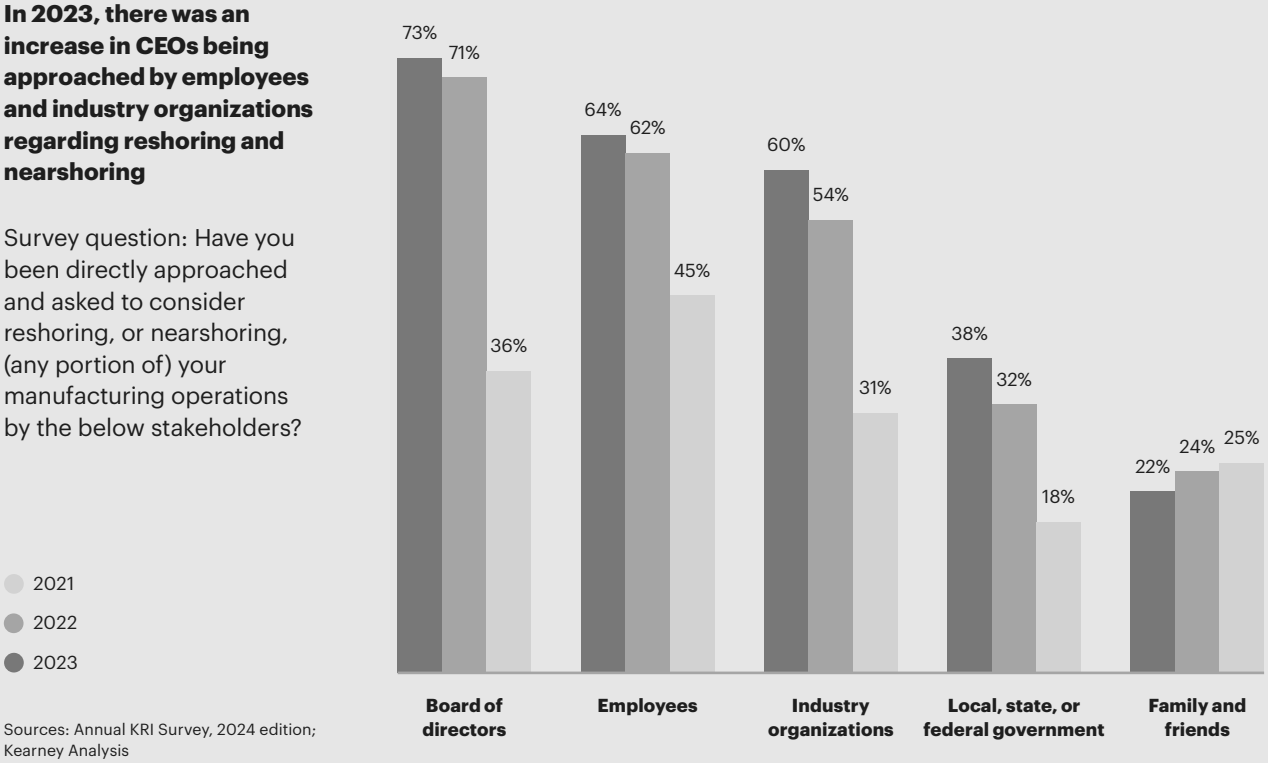
Sources: Unites States International Trade Commission; Kearney analysis

Figure 4

In 2023, there was an increase in CEOs being approached by employees and industry organizations regarding reshoring and nearshoring

Survey question: Have you been directly approached and asked to consider reshoring, or nearshoring, (any portion of) your manufacturing operations by the below stakeholders?

Stakeholders discussing manufacturing footprint relocation with CEOs



Sources: Annual KRI Survey, 2024 edition; Kearney Analysis

Canada

Canada's potential as a location for some Asian LCCR imports to move to has jumped somewhat unexpectedly. America's neighbor to the north gained $13 billion in US imports last year. Total imports from Canada have also steadily increased over the past three years. In fact, since the COVID-19 pandemic, Canadian imports have kept pace with Asian LCCR imports. But in 2023, Canada saw its exports to the US increase across half of the categories, the largest being transportation equipment which showed a 28 percent increase. As a result, the 2023 near-to-far ratio (NTFR)—as compared to the 14 Asian LCCRs (including mainland China)—increased from 26 percent to 32 percent (see figure 5).[5] This means Canada's US imports are now close to a third of what was imported from the 14 Asian LCCRs.

Mexico

Last year, and for the first time since our 2013 inaugural Reshoring Index, Mexico surpassed mainland China and is now the largest exporter to the US. US imports of Mexican manufacturing goods grew from $320 billion in 2019, to $402 billion in 2022, and to $422 billion in 2023, an increase of $102 billion (32 percent) since the pre-COVID days. Mexican imports of transportation equipment increased by $22 billion (16 percent). Electrical equipment imports increased by $3 billion (9 percent). Miscellaneous manufactured commodities grew by $2 billion (18 percent) and non-electrical machinery rose by $2 billion (7 percent).

The expansion in manufacturing and warehouse space is particularly noticeable in areas close to the US–Mexico border, but the speed with which it's happening is astonishing. A leading warehousing company in Mexico reported a fourfold increase in business in just the past two years, especially around Ciudad Juárez. It's happening in industries such as automotive and electronics that already have a successful track record in Mexico, but other industries are not far behind. In previous KRI reports we've pointed to the potential of Mexico in particular to take over imports from mainland China.

[5] NTFR is the total manufactured goods imports from Mexico or Canada as % of total manufactured goods import from the 14 Asian LCCR countries.

Figure 5

NTFR from Canada saw an increase in 2023 after remaining mostly stable since 2013, besides a spike in 2019

NTFR—Total manufactured goods imports from Canada as % of total manufactured goods import from Asian LCCR countries (2013–2023)[1,2]

[1] NTFR is near-to-far trade ratio.

[2] LCCR is low-cost countries and regions.

Sources: United States International Trade Commission; Kearney analysis

We saw several US companies ask their Chinese suppliers to set up a "shorter supply chain" by adding a location in Mexico. Although the numbers don't appear to show it just yet, this Sino-Mex collaboration has now kicked into a higher gear.

While at record levels, FDI from mainland China into Mexico is only $600 million. However, Chinese companies announced 19 investments between January and November of 2023, totaling $8.14 billion, that have yet to show up in FDI reports.[6] For example, because it was made in October, Lingong's $5 billion investment announcement couldn't show up in the most recent official Secretaría de Economía (SE) data which only covers activities during the first nine months of 2023. We anticipate that these announcements will materialize in FDI within the next two to three years.

There are other reasons why some Chinese investments in Mexico are not recorded as such in the Mexican FDI numbers. Some of these investments are funneled through subsidiaries in the United States or other countries. Others are made by joint ventures between Chinese and Mexican enterprises.[7] A more indirect, but nonetheless telling, statistic concerns air travel between mainland China and Mexico which is starting to pick up after a three-year COVID-related dip. The number of Chinese visitors to Mexico almost doubled, increasing 84 percent from 87,593 in 2022 to 161,316 in 2023. Although this likely includes a fair number of tourists, this seems to support the trend of Chinese businesses' rising interest in Mexico that we first reported on in our 2018 Reshoring Index. This is especially true if you combine the number of Chinese visitors with the news that both mainland China's and Mexico's national aviation agencies are collaborating to "restore, increase, and improve air traffic, both in terms of passengers and cargo flights."

Of course, goods still tend to mostly travel by ocean and, here again, we find evidence that seems to confirm this hypothesis. The annual growth rate in container shipping from mainland China to Mexico reached 34.8 percent in 2023, a significant increase from just 3.5 percent in 2022, and it further increased another 60 percent in January 2024 compared to January 2023.[8]

Whether or not this potential flood of Chinese investments will impact when and how the Mexican government addresses its infrastructure and utilities challenges remains to be seen. Compared to mainland China, Mexico's logistical infrastructure is less developed, with a Logistics Performance Index score of 2.9/5 vs. a 3.7/5 for mainland China.[9] Energy dependence and infrastructure are other areas of concern. Mexico relies heavily on imported natural gas, mostly from the US. And overall, it struggles with an already strained and erratic electricity supply that will be further stressed as more companies move into the country. And then there's the water issue. Conagua, the National Water Commission, is already reporting shortages amid widespread drought and scorching temperatures.

Tackling all these challenges will be crucial if Mexico hopes to continue attracting (Chinese) manufacturing investments.

United States

The United States also picked up its fair share of former Asian LCCR imports, although the minimal decrease in MGO, by $9.8 billion from $7.245 trillion in 2022 to $7.236 trillion in 2023, might lead you to think otherwise, especially when US GDP rose 2.5 percent in 2023.

However, according to the Bureau of Economic Analysis (BEA), personal consumption expenditures (PCE) on goods increased by just 3 percent, from $5.997 trillion in 2022 to $6.192 trillion in 2023. This contrasts with the 9 percent increase observed from 2021 to 2022 and suggests a relative slowdown in goods consumption vis-à-vis services consumption. Therefore, combined with the inventory burn-off mentioned earlier, the portion of domestically manufactured goods consumed by the US has, relatively speaking, still increased. Early indications in 2024 also show that US manufacturing is continuing on the way up if you consider the Q1 readings of the ISM manufacturing PMI and S&P Global's manufacturing indexes.

Returning to the theme of this year's report, will bringing manufacturing closer to the US domestic market ultimately be a flash in the pan, stoked by worries about geopolitical tensions? Will domestic manufacturing survive after the current round of federal incentives that essentially amount to commercial handouts? Or will America continue rebuilding its manufacturing base, potentially supported by an ecosystem of suppliers from both Mexico and Canada?

[6] Source: Integralia, as quoted in *Mexico News Daily*
[7] Source: Enrique Dussel Peters - Center for Chinese-Mexican Studies at the National Autonomous University, as quoted in the *EL PAIS*
[8] Source: Analysis by Xeneta and Container Trade Statistics
[9] The LPI is an interactive benchmarking tool created to help countries identify the challenges and opportunities they face in their performance on trade logistics and what they can do to improve their performance.

Chinese exporters focus on the future

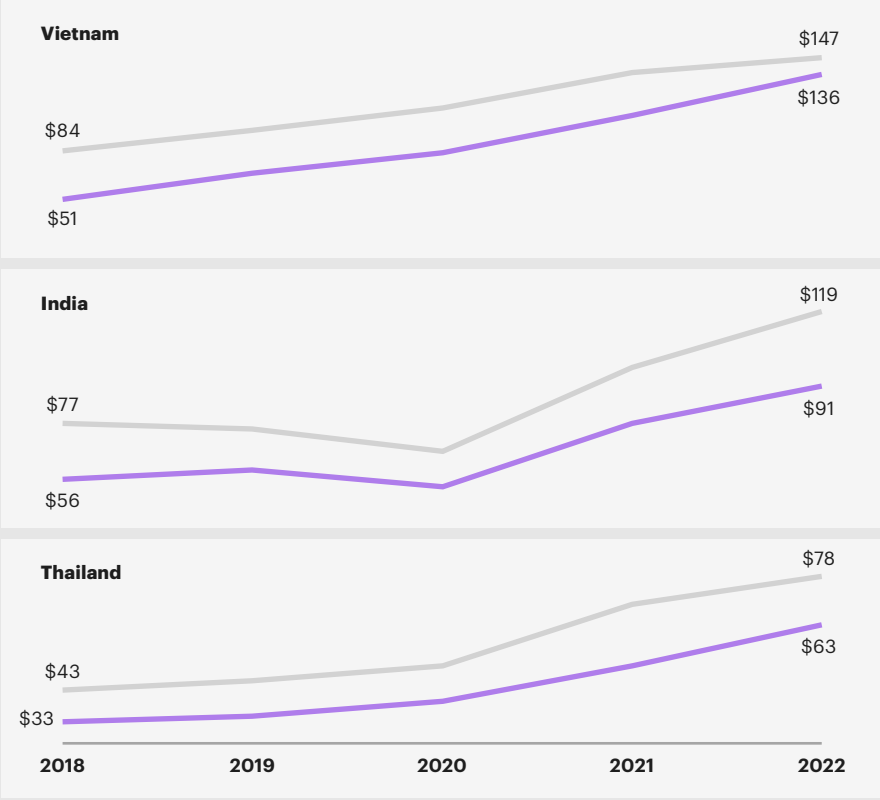
The United States may not be importing as much as it has from mainland China, but that doesn't mean Chinese manufacturers are standing still. In fact, nothing could be further from the truth. Chinese companies are still very much in the US import game and quickly adapting to a global market impacted by new re- and nearshoring developments.

Chinese exports to other US importers have been increasing steadily but saw a jump of 26 percent in 2021 ($715 billion to $905 billion) and of 8 percent in 2022 to $975 billion. Mainland China is running trade surpluses with countries such as Vietnam, India, and Thailand, which in turn are running widening surpluses with the US. There was a 75 percent increase in Vietnam's imports from mainland China in 2022 compared to 2018. Over that same period, Vietnam has been one of the biggest winners in the global reshuffle of US-bound exports.

Looking below the surface we see a correlation emerging between increasing US imports from Asian LCCRs, excluding mainland China, and the imports these countries receive from mainland China. As shown in the figure, the top Asian countries' imports to the US are almost directly proportional to their imports from mainland China. So, even though it may seem as though other Asian LCCRs have replaced mainland China in terms of imports into the US, it appears that, in some cases at least, they've become a stopover in the journey of manufactured goods from mainland China to America.

Figure
Flow of US imports and Chinese exports with top Asian LCCRs

Comparison of US imports from Asian LCCRs vs. Chinese exports to other Asian LCCRs
(2018–2022, $ million)



Note: LCCR is low-cost countries and regions.

Sources: United Nations Comtrade Database Trade Data, United States Census Bureau; Kearney analysis

Further analyses of the trade data indicate a strategic shift among Chinese manufacturers, away from assembling end products domestically toward leveraging international manufacturing hubs in Southeast Asia and, increasingly, Mexico (for example, for final assembly). This shift can also be seen in mainland China's FDI, which shows how Chinese companies have been stepping up investments in Vietnam, India, Thailand, and Bangladesh, but also in Mexico and even Poland, which presents opportunities for a foray into Europe, particularly for electric vehicles (EV), without running afoul of the Carbon Border Adjustment Mechanism (CBAM).[10] Increased investments have also recently been observed in Africa and in Morocco, a free trade partner of both the European Union and the United States, with close proximity to Europe and the Middle East. From an industry point of view, the technology, metals, and mining sectors have been the primary beneficiaries of these Chinese capital infusions.

To better understand how all these shifts in goods and capital flows could play out, look no further than BYD, which plans to construct an EV assembly plant in Thailand with an annual capacity of 150,000 cars, and a component manufacturing and assembly facility in Vietnam, aimed at producing car parts for export. The company is also exploring an EV manufacturing facility in Mexico's Jalisco state. And as part of their preliminary evaluations of Mexican sites, BYD has included one of its suppliers, Haitian, a manufacturer of auto part machinery, in the conversation.

Mainland China is also trying to make itself indispensable in global markets by shifting away from labor-intensive industries toward more advanced and higher value-added manufacturing operations where innovation, not labor cost, is the key to success. Over the past few years mainland China has filed the largest number of patent cooperation treaty (PCT) applications, seeing benefits on its exports of three renewable energy products—new energy vehicles, solar cells, and lithium batteries.

And if all else fails, mainland China can fall back on its proven pricing strategies. As a result of oversupply in the Chinese markets, and the corresponding downward pressure on labor costs which are more malleable in mainland China, prices for many Chinese products started declining toward the end of 2023. This is leading to an increase in exports which, in turn, is resulting in an increase in the global market share of goods manufactured in mainland China in early 2024. So far, this increase has primarily been seen in exports to the BRI countries, some of the Asian LCCRs we've mentioned and, of course, Mexico.

[10] The CBAM is the EU's tool to put a fair price on the carbon emitted during the production of carbon-intensive goods that are entering the EU, and to encourage cleaner industrial production in non-EU countries. CBAM will apply in its definitive regime from 2026 onward, while the current transitional phase lasts between 2023 and 2026.

Here to stay?

Answering that question requires us to first look at whether US companies and consumers are starting to truly "buy American"—especially when the purchase comes with a higher price tag. Our "US self-sufficiency index" may give us an indication.[11] It tracks how what's made in the United States for the US market compares against what's imported and stays in the US market. This US self-sufficiency index gradually declined from 2013 to 2020 but started flipping modestly in 2021 and increased by 5 percent between 2022 and 2023 (see figure 6).

On the supply side, although investment in capital goods leveled off after mid-2022 in the face of ongoing inflation and geopolitical strife, it does continue—both to establish new, modern manufacturing operations and to further automate existing domestic operations to improve cost efficiency and overcome labor and skills availability challenges. Of the roughly $900 billion in investments in capital goods in 2023, about $250 billion was invested in new factory construction, a 73 percent increase from a year ago and a 136 percent increase over two years ago.

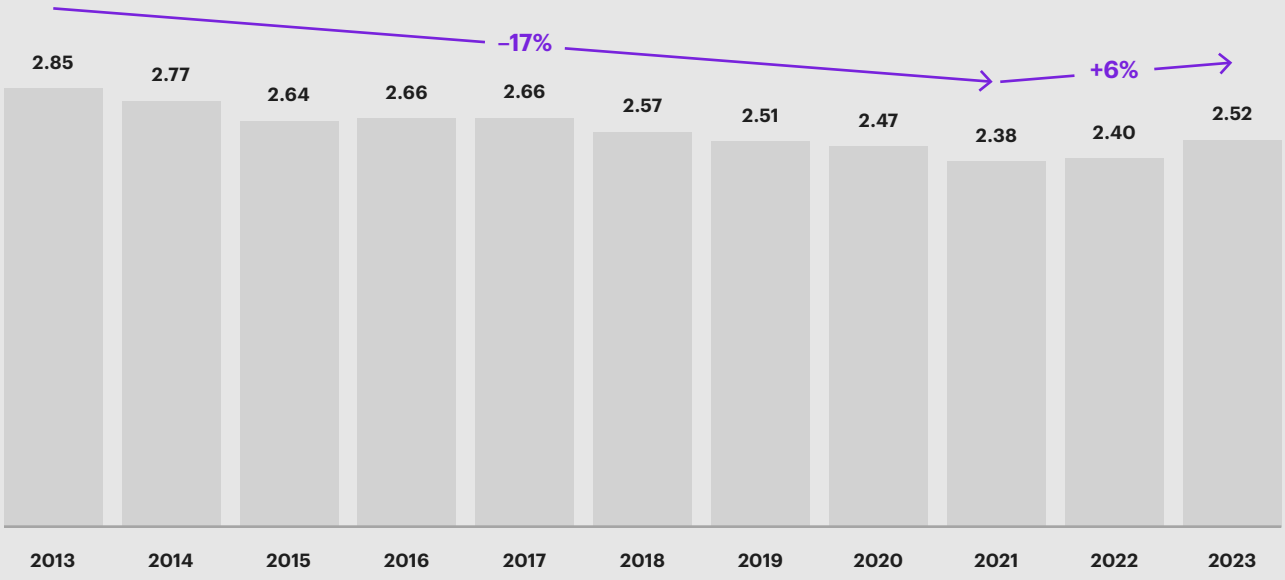
Our annual KRI survey corroborates this. Among respondents looking at bringing manufacturing operations closer to the US domestic market, 86 percent are considering the US (see sidebar: Transatlantic ties on page 11). And 54 percent of the CEOs who have already reshored part of their operations are currently preparing to reshore additional manufacturing operations.

Somewhat surprisingly, so far only 50 percent of KRI-surveyed companies say that they've benefited from either the CHIPS and Science Act or the Inflation Reduction Act (IRA). But that may be about to change. A recent survey conducted by Rabin Roberts Research on behalf of BDO found that, as they expand their US operations, 52 percent of the manufacturing CFOs plan to conduct reviews to uncover new opportunities to claim tax credits.

[11] US self-sufficiency index is (MGO - annual exports) / (imports - re-exports).

Figure 6
In 2023, the US self-sufficiency index saw the largest growth since 2013

US self-sufficiency index
(2013–2023)



Sources: United States International Trade Commission, United States Department of Commerce Bureau of Economic Analysis; Kearney analysis

Another indicator is what's happening to the supply base needed to support domestic manufacturing. This has been a challenge for first movers into the reshoring arena. The number of mentions of "shortages" of raw materials and parts in the Federal Reserve's latest Beige Book has fallen back to pre-COVID levels, but our KRI survey results found that only 34 percent of companies that reshored manufacturing operations are able to source all raw materials locally and just 41 percent are able to source all parts locally. To address this challenge, 26 percent of those companies have already asked their Asian suppliers to move manufacturing closer to the US and 53 percent are considering asking them to relocate.

One notable approach companies are taking to address growing pains in their supply base is to start up production themselves rather than relying on contract manufacturers. A majority of surveyed CEOs indicated they are considering moving a portion of their manufacturing processes back in-house to address concerns around cost control, sustainability, and supply chain resilience. In-house manufacturing also enhances visibility and transparency within the supply chain, which is crucial in an era where it seems significant supply chain challenges are lurking around every corner.

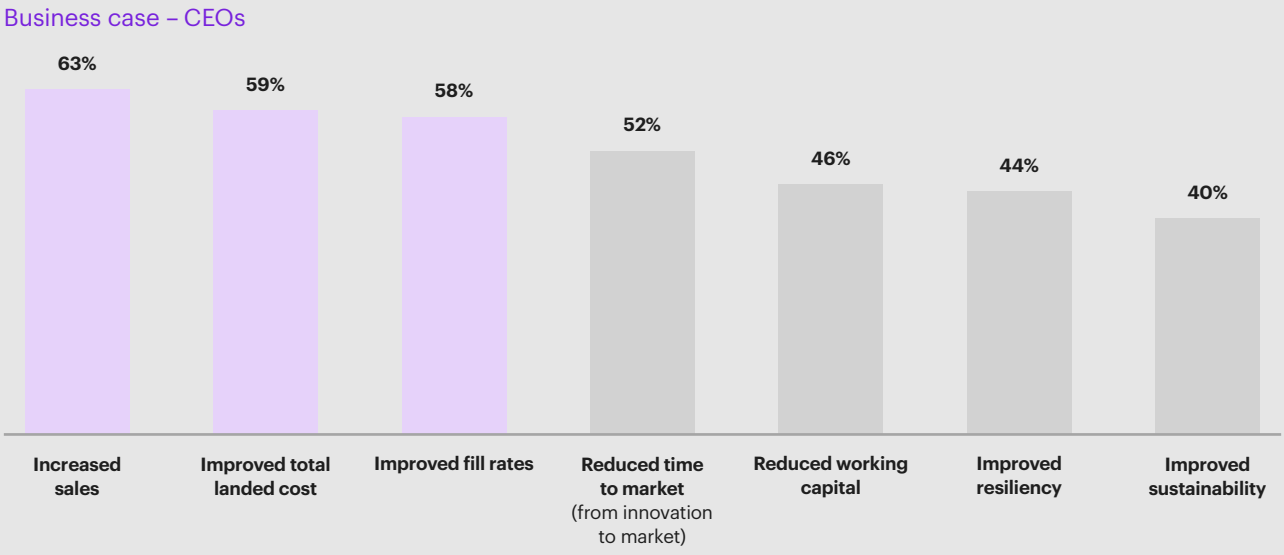
Ultimately, all this needs to find its way into a business case executives can put in front of their board to justify reshoring. The key components companies are reportedly including in their business cases are largely the same as we've seen in previous years (see figure 7). Improved total landed cost has jumped to the second spot in the list of business case elements. This is likely linked to the almost constant barrage of international "transportation snags" that were experienced in 2023. The other three of the top four elements are tied to top-line improvements, which underscore ongoing resilience concerns around long supply chains.

We expect these issues to remain top-of-mind in the near future. The recent Kearney COO Study 2024, conducted in collaboration with Amazon Web Services (AWS), revealed COOs are increasingly looking for innovation and collaboration to drive growth—which is a lot easier to do when you're operating a supply chain with supply partners within the country or just across the border, versus an ocean away.

Figure 7

The top business case elements for CEOs regarding reshoring and nearshoring include increased sales, improved total landed cost, and improved fill rates

Survey question: What elements did you put into the business case behind your decision to reshore/nearshore and adjust your manufacturing footprint?



Sources: Annual KRI Survey, 2024 edition; Kearney Analysis

Transatlantic ties

Despite the fact that, overall, the EU's share of global exports has been dropping over the past few years, in 2023, Europe demonstrated remarkable relative growth in imports into the US as its share increased by 1.2 percent, to 24.6 percent. Due to the overall drop in US imports, that only translates into an overall increase of approximately $7 billion compared to the previous year, out of a total import value of $658 billion in 2023. But, in relative terms, Europe import growth was only surpassed by Mexico, which added 1.4 percent to its relative portion of US imports.

Although primary metals manufacturing, petroleum and coal products, beverages, and tobacco products all saw significant decreases of as much as 30 percent, these reductions were more than offset with growth in key industries including transportation equipment, which witnessed a substantial increase of $14.6 billion (15.5 percent), and non-electrical machinery, which surged by $11.0 billion (14.9 percent). Computer and electronic products also saw an uptick of $2.8 billion (5.8 percent).

But the most surprising increase was seen in the chemicals sector, which contributed an additional $6.0 billion (3.1 percent) of growth. The increase was primarily driven by destocking the high levels of inventory from previous years when US chemicals buyers overordered to ensure they could meet demand and stave off inflation. With the exception of flows from Europe, 2023 saw a decrease in chemical US imports from almost all countries.

Trade ties between Europe and the United States could potentially further strengthen. Increasing manufacturing costs in Europe, tied to the loss of access to the cheap energy supplies from Russia, has pushed many European countries to look toward the US as an alternate manufacturing destination.

For example, German firms committed $15.7 billion in capital projects to the US in 2023, up from $8.2 billion in 2022. The IRA plays a role as well. Northvolt, a Swedish battery maker backed by Volkswagen, BMW, and Goldman Sachs, determined they could receive IRA subsidies of $600 million to $800 million for their American factory, compared to the €155 million in incentives they would receive if they built it in Germany.

Scalable and sustainable

There is little question that the US business community has a clear interest in promoting "Made in the US, for the US." But before we can determine if this is a scalable and sustainable strategy, we have to turn our attention to the American business environment.

Opportunity is not created in a vacuum, especially with elections around the corner. Incentives for domestic manufacturing such as CHIPS and IRA are already in place (see sidebar: The importance of ROCE on page 13). But we need to take a deep and objective look at two other even more crucial areas needed for building a sustainable manufacturing operation—labor and infrastructure. And the lack of skilled labor is one of the biggest hurdles manufacturers have reportedly had to clear as they reshore.

According to the US Bureau of Labor Statistics' Job Openings and Labor Turnover Survey (JOLTS), there were 601,000 open US manufacturing jobs in December 2023. Labor shortages are more acute in some industries than in others. The Semiconductor Industry Association and Oxford Economics have released a report projecting that by 2030, due to a lack of skilled labor, 58 percent of semiconductor jobs and 80 percent of projected new technical positions will go unfilled.[12] The problem is partially demographic. More skilled American workers are retiring than are entering the workforce. By 2030 the US will experience a net loss of 26,400 technicians, 27,300 engineers, and 13,400 computer scientists.[13] Meanwhile the need for people to take over those technical roles will continue to significantly increase as manufacturing becomes increasingly automated and digital.

[12] "Chipping Away: Assessing and Addressing the Labor Market Gap Facing the U.S. Semiconductor Industry," www.semiconductors.org
[13] "Chipping Away: Assessing and Addressing the Labor Market Gap Facing the U.S. Semiconductor Industry," www.semiconductors.org

Several companies, including the likes of Amsted Rail, Graco, Intel, and Nissan Motors, are trying to close that skills gap by committing grants, furnishing labs, donating equipment, and offering training programs and scholarships to local universities and community colleges to train the future labor force that manufacturers need today and will need in increasing numbers tomorrow.

Nonprofits such as the US Center for Advanced Manufacturing (USC4AM) also are playing a part. Their "Accelerating Technology Adoption" initiative hopes to power US manufacturing into the future by fostering collaboration among all stakeholders, from industry to policymaker. In the shorter term, though, many companies are reporting a reluctance to invest in training their current workers. Their reticence is rooted in the fear that as soon as they have completed training, employees will leave in search of a better opportunity. It's not an idle fear, especially given the number of skilled jobs that are going unfilled right now.

Government can, and likely should, play a role here that goes beyond doling out incentives. Upskilling designed to support the transition of domestic workers away from declining industries is one approach offering potentially quick results. Public policies at the federal, state, and local levels could also provide some relief, albeit over the long term. International examples of how this might work are found in Singapore, where multiple secondary-school programs nudge students to career paths based on their interests and abilities, and Germany where the Meisterschule (master schools) form a nationwide network linking schools to specific industries.

Unfortunately, these actions by both businesses and government are insufficient to close the skilled employment gap in the short term. Few levers are available to fast-track the size and skill level of the labor pool. And one in particular—immigration—is highly contentious given the current US political climate. With relatively few US-born students majoring in STEM fields in the past decade, the US may have no choice but to rely on immigrant labor to support reshoring, especially in industries such as semiconductors where previous studies found 40 percent of current high-skilled workers were born abroad.[14]

Now let's look at infrastructure. On the heels of a November 2021 American Society of Civil Engineers (ASCE) Infrastructure Report Card C- rating, the current US administration enacted the Bipartisan Infrastructure Law (BIL), which channeled $1.2 trillion in federal funds into projects related to roads, railways, ports, energy, and climate infrastructure to support increasing domestic manufacturing.[15]

More than $300 billion was set aside for repairing and rebuilding roads and bridges over the span of five years. The administration also announced more than $368 million in grants to improve rail infrastructure and enhance and strengthen supply chains.[16] And in November 2023, the US Department of Transportation (DOT) announced it will invest $653 million into port improvement projects across the US to help increase capacity and efficiency, enhance cargo handling capacity, and accommodate larger vessels.[17] A total of 41 port improvement projects across the country are being supported through the Port Infrastructure Development Program.

While predictions regarding the exact future grade remain speculative—ASCE won't release its next report card until 2025—these targeted investments in underperforming infrastructures suggest we will see noticeable improvements that will help the US prepare for further reshoring and increased self-reliance.

[14] As quoted in Brookings article, research by Center for Security and Emerging Technology (CSET)
[15] www.infrastructurereportcard.org
[16] "Biden Administration Announces Over $368 Million in Grants to Improve Rail Infrastructure, Enhance and Strengthen Supply Chains," www.railroads.dot.gov
[17] Source: US Transportation Department

The importance of ROCE

Since the enactment of the 2021 CHIPS and Science Act, the private sector has announced investments in semiconductors and electronics manufacturing capacity totaling $231 billion. That's an impressive number, and in light of Intel's recent announcement that its 2023 $7 billion operating loss for its chip-making unit is "a cost of winning back American supremacy in chip production," it begs the question, "Can these private companies reasonably expect a market-competitive return on capital employed (ROCE), even with the government providing some of the funding?"

United States Secretary of Commerce Gina Raimondo expects the United States to be on track to produce 20 percent of the world's advanced logic chips by 2030. Today, the US only produces around 10 percent of the world's chips and none of the most advanced chips. The capital needed to build and deploy leading-edge nodes is roughly twice the amount needed for older nodes, so the amount of investment puts downward pressure on any ROCE calculation.

Further, the US is hampered with a shortage of workers with the necessary specialized expertise, both to install equipment in semiconductor-grade facilities in a timely fashion as well as to operate them cost-efficiently and gain a competitive advantage. The shortages of STEM degrees is an issue that goes beyond semiconductor manufacturing itself and also creates challenges with running best-in-class manufacturing operations for, for example, chemicals and equipment that are required by semiconductor plants.

Another issue relates to shoring up the supply of critical raw materials.

Mainland China and the United States are employing very different strategies to secure their respective competitive positions in the highly competitive global chip market. In response to the US government's efforts to curb mainland China's advancement in AI technology by restricting the export of advanced chips to mainland China, mainland China restricted exports of critical minerals such as gallium and germanium which, like many of the other global critical minerals, it controls. Mainland China increased restrictions on its critical minerals exports nine times between 2009 and 2020, more than any other country that has reserves of these minerals.

And, less talked about when it comes to the CHIPS and Science Act but equally critical, the US will need back-end assembly, test, and packaging operations (ATP) that are currently predominantly based in Asia.

The success of the US semiconductor ecosystem hinges, therefore, as much on upstream self-sufficiency in critical minerals as it does on its manufacturing capability in fab and downstream ATP. Recent findings suggest that the United States possesses significant reserves of these minerals, but extraction and processing are time-consuming and can have substantial negative environmental impacts. Effectively managing these impacts, securing supply chains, and promoting responsible sourcing of critical minerals are all crucial for the future of the US semiconductor industry.

Even if, despite these challenges, the US is able to establish a competitive domestic semiconductor industry, mainland China will not be standing still. Chinese companies are attempting to bridge the chip manufacturing gap by recruiting foreign experts, and partly state-owned foundry SMIC is already a legitimate foundry operation that is at scale to innovate. It can expect that mainland China will continue to stay competitive and will keep scaling capacity, which will push down the price/unit (as we've seen with solar panels and EVs, among others).

Of course, mainland China and the United States aren't the only two countries ramping up semiconductor manufacturing capacity. Investment plans have been announced by—among other nations—Germany (Intel), Japan (Micron Technology), and India (Vedanta Resources, together with Foxconn), which have less issues with labor and minerals access than the US. As a result, it's plausible that once all this capacity comes online it will create overcapacity in certain tech nodes. This is good from a supply chain resilience perspective, especially in light of recent calamities like the Taiwan earthquake, but less so from a pricing power perspective and is likely to put further pressure on the profitability of US fabs.

For the United States, building a solid, sustainable domestic semiconductor industry undoubtedly has national security and other advantages, but there's no guarantee that the investment will ultimately pay itself back in ROCE terms.

Although helpful, government subsidies cannot make the economics work forever and the US fabs need to figure out how to be competitive on a cost per wafer basis.

Conclusion

The shift to making goods for the US market closer to that market is now well established.

This year's peaking Kearney Reshoring Index, alongside strong continued interest from CEOs in reshoring and nearshoring activities, on top of clear indications that companies and consumers are "buying American," underscores what now appears to be a decisive shift in strategic business operations toward manufacturing products closer to the US domestic market.

Notably, the import of goods from mainland China to the US last year dipped to levels lower than those of 2013, accounting for less than 50 percent of imports from Asian LCCRs. Imports from Asian LCCRs, such as Vietnam and Malaysia, that had previously benefited from a decline in imports from mainland China also took a hit. But the US needs to proceed with caution.

The apparent statistical decline in mainland China's imports to the US belies the significant but often nuanced influence it continues to wield on the global manufacturing stage. Mainland China's ingress into the Mexican manufacturing landscape is certainly worth following.

But despite these complexities and nuances there is undeniable momentum toward repatriating manufacturing to the United States. The strategic recalibration toward reshoring, however, is not without its challenges. Beyond the skilled labor shortage, the US manufacturing sector continues to grapple with issues including product quality challenges and the relatively high cost of labor, skilled or not, as well as an infrastructure that's still being rebuilt on the fly.

Addressing these challenges necessitates sound government initiatives and policies combined with sustained public and private investment in workforce upskilling, infrastructure development, and the integration of automation technologies, potentially catalyzed by advancements in generative AI. Besides that, the strategic engagement of North American partners Mexico and Canada has emerged as a mission critical element of this reshoring narrative, both as potential sources of raw materials and parts as well as of skilled or unskilled labor. As we've seen all of these elements gradually come together over the last few years, we can see a robust future for domestic manufacturing.

This year voters in at least 64 nations—representing about 50 percent of all the people on Earth—will head to the voting booth. So there's a high likelihood companies and politicians will need to divert their attention—and potentially funding—elsewhere this year in response to election outcomes in the US and many other countries. But the groundwork for a North American manufacturing resurgence has been put in place. So, even if we see a dip in 2024 in our next Reshoring Index, our money is still on "Made in USA!"

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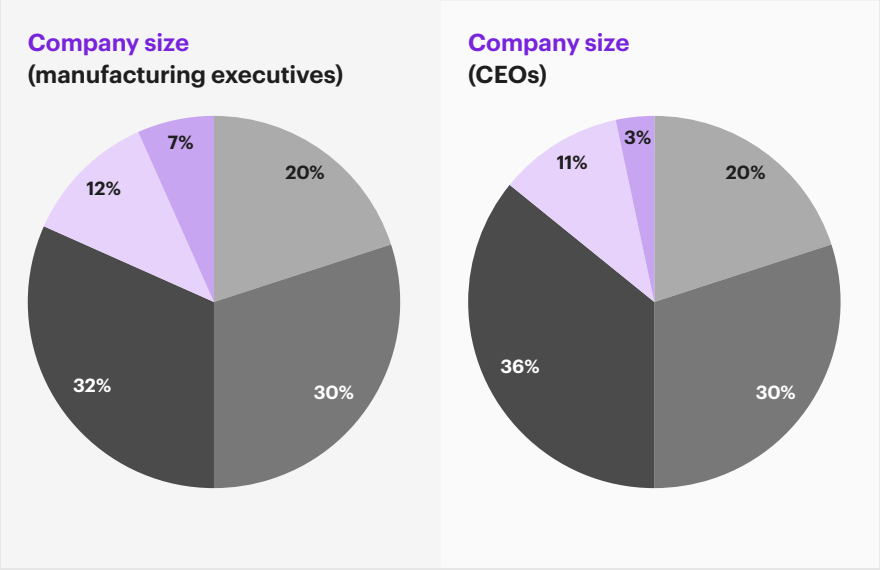
Appendix

Figure A
Reshoring Index survey demographics

- $0–$250 million
- $250 million–$1 billion
- $1 billion–$5 billion
- $5 billion–$10 billion
- More than $10 billion

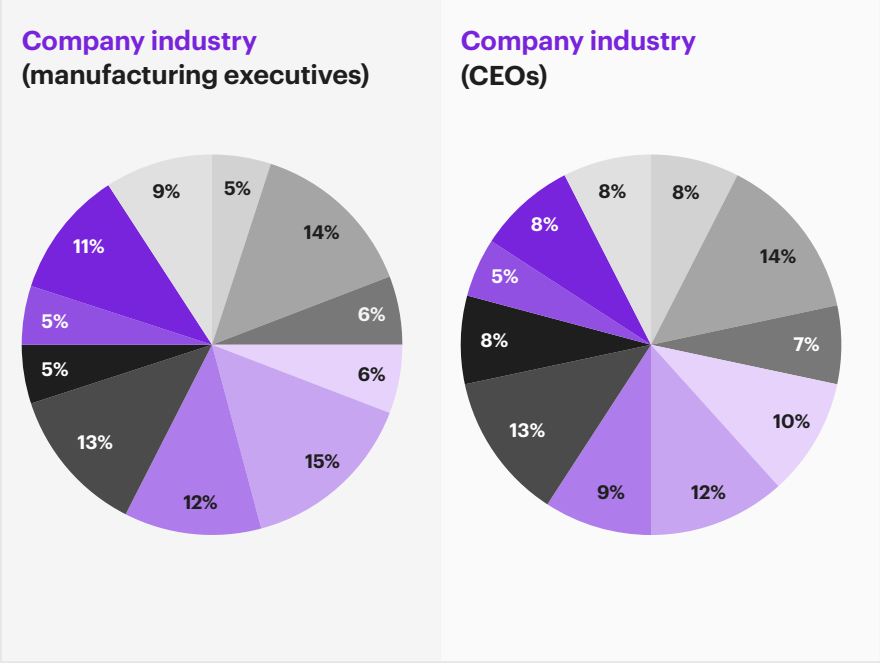


Notes: Percentages may not add to 100% due to rounding. "Executive" means director or higher.

Sources: Annual KRI Survey, 2024 edition; Kearney Analysis

Figure B
Reshoring Index survey demographics

- Apparel and textiles
- Automotive and transportation
- Beauty and cosmetics
- Chemicals, paper, plastics, rubber
- Computers and telecom
- Electrical equipment, appliances, components
- Food and beverage
- Furniture, household goods, toys
- Health, pharma, medical devices
- Non-OEM manufacturing[1]
- Primary metal, fabricated metal, large machinery



[1] Non-OEM manufacturing (i.e., ODM, CEM, EEM, EMS, etc.)

Notes: Percentages may not add to 100% due to rounding. "Executive" means director or higher

Sources: Annual KRI Survey, 2024 edition; Kearney analysis

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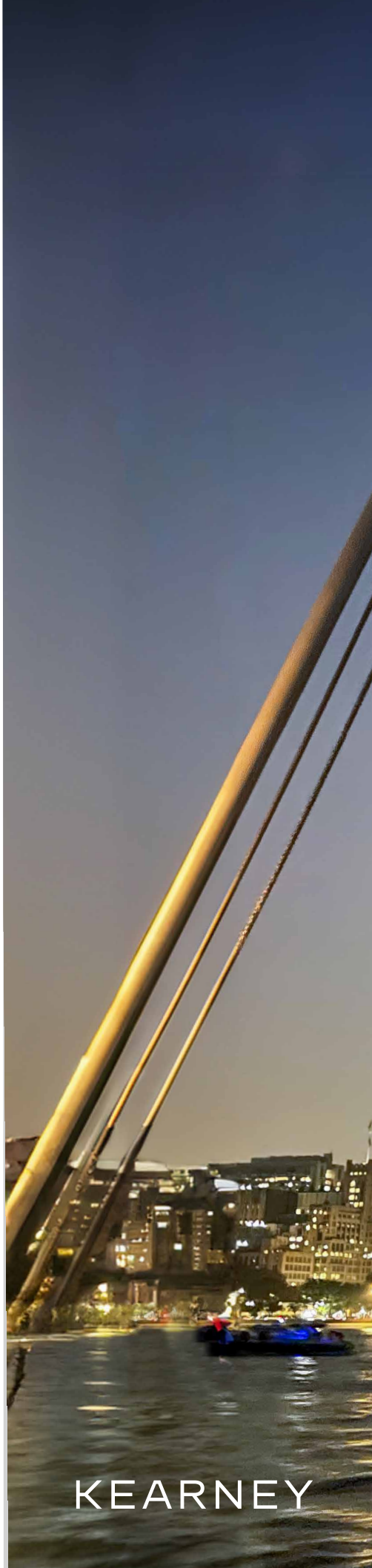
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