

**Forecast Report
February 2025**



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Economic Overview

Growth Lies Ahead; Here Are Some Key Drivers:

Consumers: Rising incomes and inflation-adjusted savings balances will help boost Retail Sales rise in the years ahead. Higher-income earners and those who saw their home prices rise and stock portfolios increase in value in recent years will likely drive much of the growth. Those demographics struggling with inflation should get some relief in 2025, but price sensitivity will linger. Retail Sales growth will start out sluggish in early 2025 but then ramp up later in the year.

Interest Rates: The Federal Reserve has shifted to a more accommodative monetary policy; however, a lower Federal Funds Rate (a short-term rate) does not necessarily equate to lower interest rates for businesses and consumers. Commercial loans and mortgage rates trend similarly to US Government Long Term Bond Yields, which we anticipate will likely generally rise this year. When deciding on capex, focus on timing the ROI to best align with your market trends. Aim to have the payback period completed ahead of the 2030s, as we anticipate tougher economic times in that decade.

Inflation: Prices will generally rise in the coming years, picking up the pace in the second half of 2025. Inflation will be temperate relative to levels of 2021 and 2022, but not as low as in the 2010s. If further tariffs are put in place, they could pose an upside risk to our pricing outlooks.

Businesses: While borrowing costs are unlikely to come down, elevated corporate profits and corporate cash will allow businesses to spend more. We expect the investments in domestic capacity made in recent years will have a cumulative positive effect, helping the economy reach record heights. Rise will be driven both by higher volumes and higher dollar values. Efficiency gains will be necessary to maintain or improve margins.

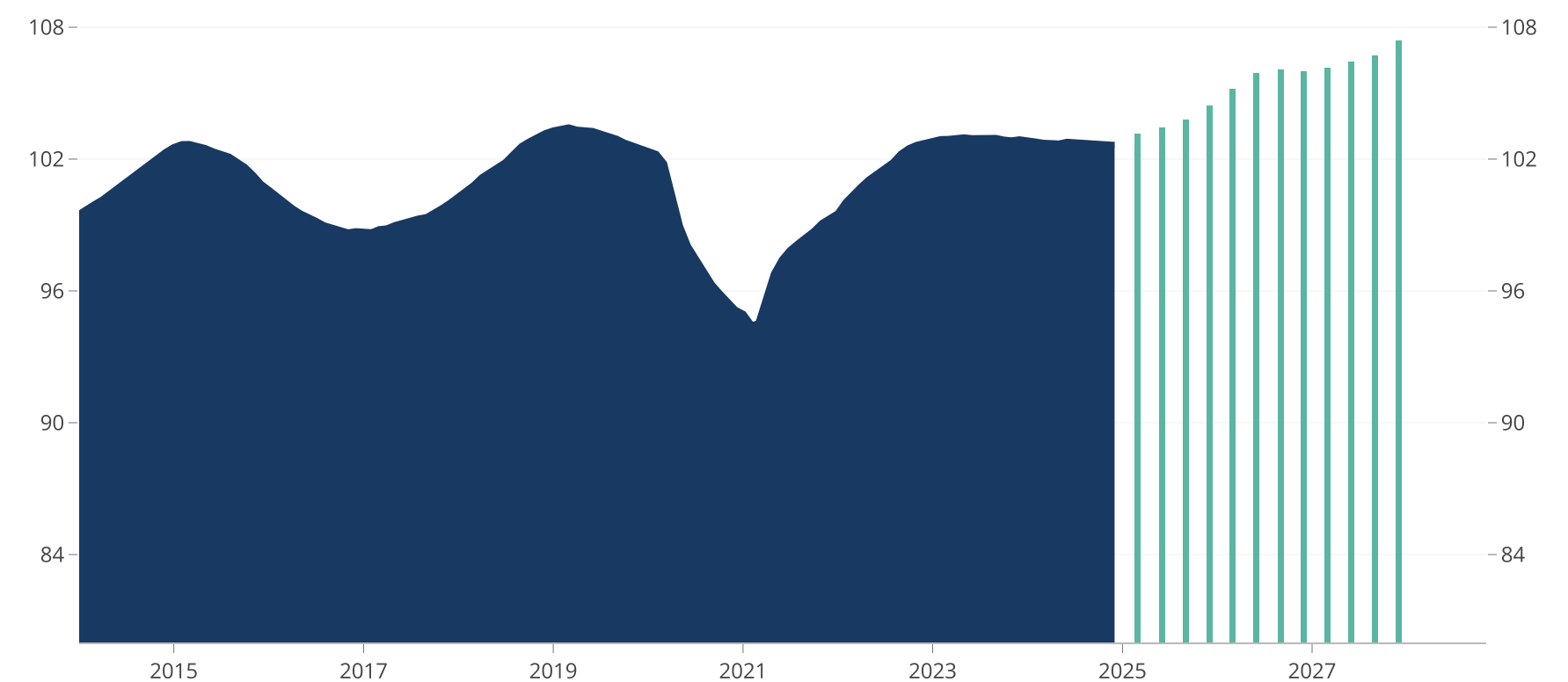
The Labor Market: Labor challenges will persist in the upcoming years, as will the upward pressure on wages. While the labor market has softened, it will remain relatively tight in the coming years due in part to the aging population. It will be important to focus resources on attracting and retaining talent. Keep your wages and benefits competitive for your region and industry.

Tariffs: The state of tariffs is actively evolving. If widespread, they could result in higher prices and lower volume growth, but growth is still the likely trajectory. Tariffs typically have acute microeconomic impacts. Each business's exposure to tariff risks is unique. Analyze your supply chain to estimate your risk exposure. Build contingency plans both internally and, if possible, with your upstream and downstream business partners. Consider reaching out to a customs and duties specialist. Think back to previous tariffs and periods of supply chain volatility: What could you have done differently, and what worked well?

Key Industries and Takeaways for Your Business

It may feel difficult to be optimistic at this point in the business cycle, but there are green shoots. Leading indicators, including the ITR Leading Indicator™, point to upcoming business cycle rise. There will be areas of opportunity within nonresidential construction, notably data centers, as they are in high demand and likely to rise in the coming two years. Within the industrial sector, manufacturing related to technology will likely be an area of opportunity. What is your business doing to prepare for general macroeconomic rise in the second half of this decade? Do you have the capacity needed to take on more activity, or can you harness new technologies to increase productivity? Rising prices coupled with lingering price sensitivity could cause margin squeeze. Now is the time to focus on efficiencies to protect your margins and increase your flexibility.

US Industrial Production Index Annual Average (12MMA)



Terminology and Methodology

Data Trends: Moving Averages and Totals

Quarterly Average (Three-Month Moving Average, or 3MMA)

The average of the latest three months of data, updated every month. In the example, \$57.79 is the quarterly average for the three months ending in March 2021 (i.e., the average for January, February, and March 2021).

Example: Monthly US Crude Oil Spot Prices averaged \$57.79 in the first quarter of 2021, a 26.3% increase from the first quarter of 2020.

Quarterly Total (Three-Month Moving Total, or 3MMT)

The total of the latest three months of data, updated every month. In the example, \$257.8 billion is the quarterly total for the three months ending in February 2021 (i.e., the total for December 2020, January 2021, and February 2021).

Example: Quarterly US Capital Goods New Orders totaled \$257.8 billion in February 2021.

Annual Average (12-Month Moving Average, or 12MMA)

The average of the latest 12 months of data, updated every month. In the example, 119.0 million is the annual average for February 2021 (i.e., the average for the 12-month period from March 2020 through February 2021).

Example: US Private Sector Employment averaged 119.0 million workers during the 12 months through February 2021, down 7.5% from one year earlier.

Annual Total (12-Month Moving Total, or 12MMT)

The total of the latest 12 months of data, updated every month. In the example, \$5.849 trillion is the annual total for February 2021 (i.e., the total for the 12-month period from March 2020 through February 2021).

Example: US Wholesale Trade totaled \$5.849 trillion during the 12 months through February 2021.

Growth Rates

Monthly Growth Rate (1/12 Rate-of-Change)

The percentage change between a given month and the same month one year earlier. In the example, 79.3% is the monthly growth rate for March 2021.

Example: Monthly US Copper Futures Prices were at \$4.00 per pound in March 2021, 79.3% above the March 2020 level of \$2.29.

Quarterly Growth Rate (3/12 Rate-of-Change)

The percentage change between a three-month period and the same three-month period from one year earlier. In the example, 26.3% is the quarterly growth rate for March 2021.

Example: US Crude Oil Spot Prices averaged \$57.79 in the first quarter of 2021, a 26.3% increase from the first quarter of 2020.

Annual Growth Rate (12/12 Rate-of-Change)

The percentage change between a 12-month period and the same 12-month period from one year earlier. In the example, -7.5% is the annual growth rate for February 2021; that is, US Private Sector Employment during March 2020 through February 2021 came in 7.5% below Employment from March 2019 through February 2020.

Example: US Private Sector Employment averaged 119.0 million workers during the 12 months through February 2021, down 7.5% from one year earlier.

Business Cycle Phases



Recovery (A)

The annual growth rate (12/12) is rising, but the rate of growth is still negative. We denote this phase with blue (for improving).



Accelerating Growth (B)

The annual growth rate (12/12) is rising, and the rate of growth is positive. We denote this phase with green (for go).



Slowing Growth (C)

The annual growth rate (12/12) is positive, but the rate of growth is declining. We denote this phase with yellow (for caution).



Recession (D)

The annual growth rate (12/12) is declining, and the rate of growth is negative. We denote this phase with red (for warning).

Metal Treating Institute (MTI) Markets Dashboard

Page Number	Indicator	Current		Annual Growth Rate Forecast (12/12), Year-End*		
		Growth Rate**	Phase	2025**	2026**	2027**
5	MTI Average Monthly Sales	1.8%	B	4.0%	3.4%	0.5%
6	US Industrial Production Index	0.0%	A	1.4%	1.5%	1.3%
7	US Nondefense Capital Goods New Orders (excluding aircraft)	0.6%	C	2.1%	5.0%	0.2%
8	US Construction Machinery New Orders	-1.8%	D	-2.4%	5.7%	0.3%
9	North America Light Vehicle Production	0.3%	C	0.9%	3.7%	-0.3%
10	US Heavy-Duty Truck Production Index	-0.6%	D	2.4%	5.1%	1.2%
11	US Oil and Gas Extraction Production Index	3.1%	C	2.2%	4.2%	2.7%
12	US Medical Equipment and Supplies Production Index	-2.4%	D	0.7%	0.5%	0.9%
13	US Civilian Aircraft Equipment Production Index	2.9%	B	5.7%	3.1%	3.2%
14	US Computers and Electronics New Orders	2.8%	C	1.3%	1.8%	-0.1%

*Coloring denotes the business cycle phase at year-end. For example, if a value in the first column under "Annual Growth Rate Forecast (12/12), Year-End" is colored blue, the corresponding indicator is forecasted to be in Phase A, Recovery, at the year-end indicated by the column. Green denotes Phase B, yellow Phase C, and red Phase D.

**Annual growth rate (12/12) except where otherwise noted.



Recovery (A)



Accelerating Growth (B)



Slowing Growth (C)



Recession (D)

Metal Treating Institute (MTI) Markets Dashboard

		Current		Annual Growth Rate Forecast (12/12), Year-End*		
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Page Number	Indicator	Growth Rate**	Phase	2025**	2026**	2027**
15	US Farm Machinery Shipments	2.7%	B	-2.6%	4.2%	6.7%

*Coloring denotes the business cycle phase at year-end. For example, if a value in the first column under "Annual Growth Rate Forecast (12/12), Year-End" is colored blue, the corresponding indicator is forecasted to be in Phase A, Recovery, at the year-end indicated by the column. Green denotes Phase B, yellow Phase C, and red Phase D.

**Annual growth rate (12/12) except where otherwise noted.



Recovery (A)



Accelerating Growth (B)



Slowing Growth (C)

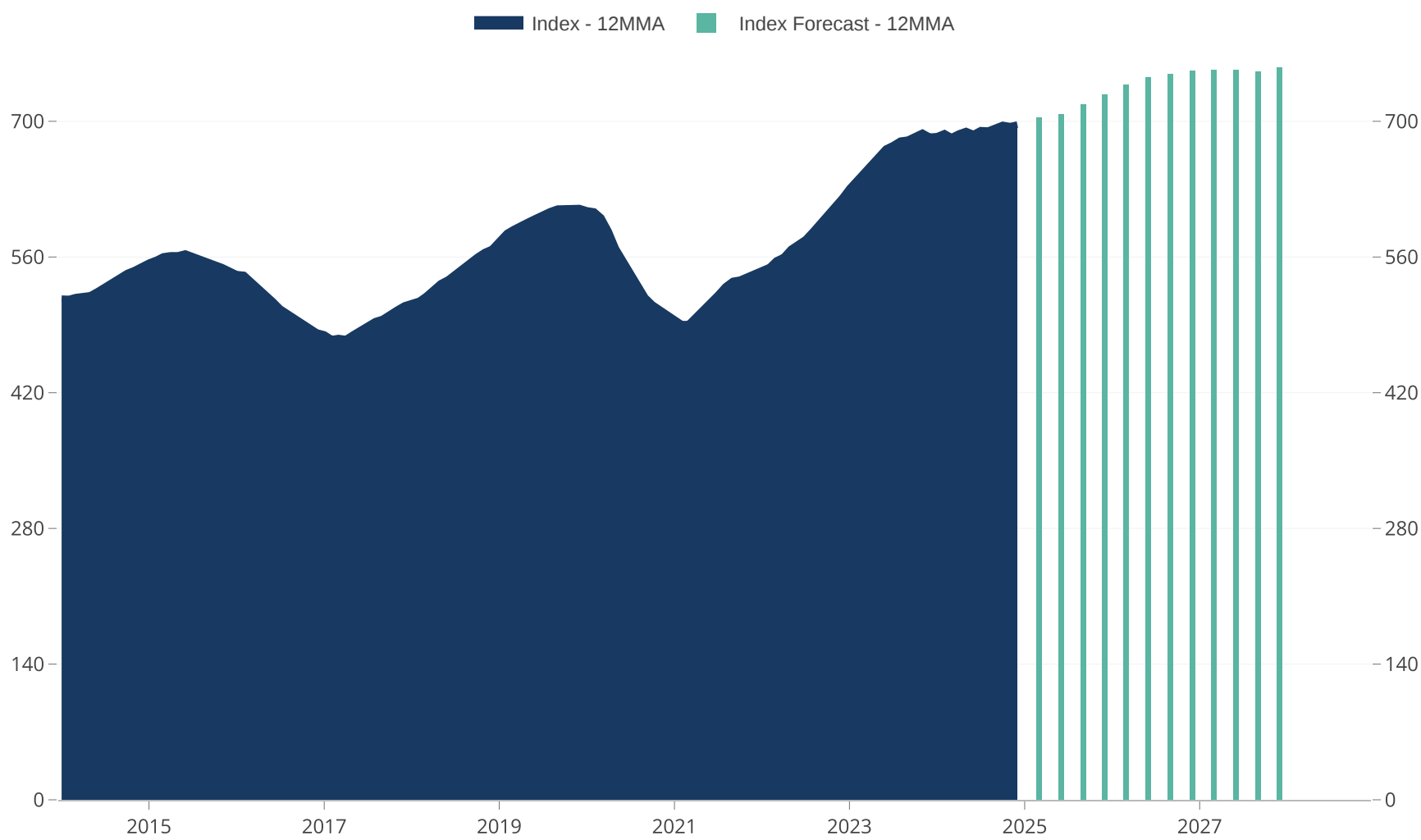


Recession (D)

MTI Average Monthly Sales

Macroeconomic Trends Will Drive MTI Sales Higher Through 2026 and Result in a Plateau in 2027

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

**Phase B
Accelerating
Growth**

Industry Outlook

Year	Annual Growth Rate
2025	4.0%
2026	3.4%
2027	0.5%

Current Indicator Amplitude

- December 2024 Annual Growth Rate (12/12): 1.8%
- December 2024 Annual Average (12MMA), Thousands of USD: \$696.6

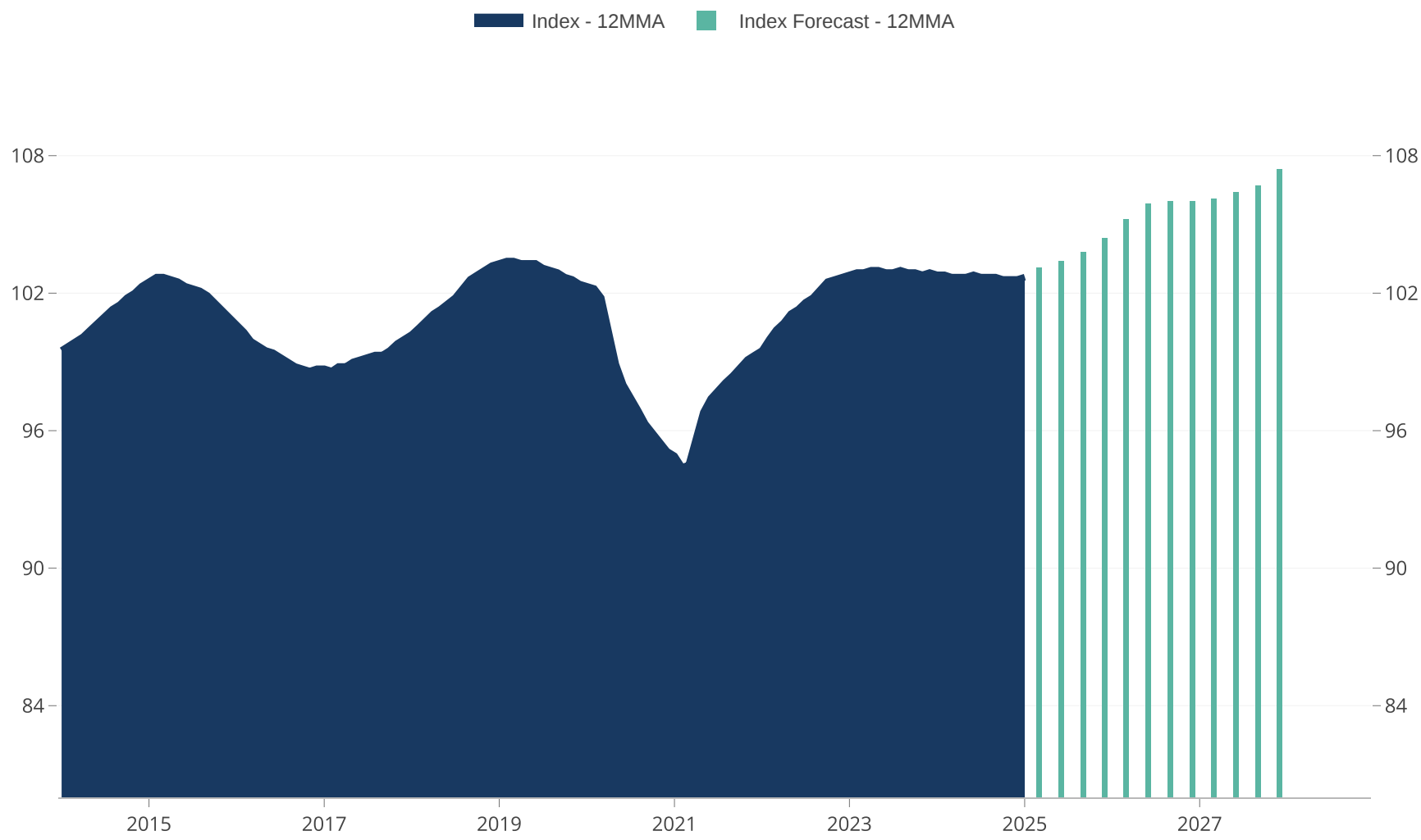
Outlook & Supporting Evidence

- MTI Average Monthly Sales averaged \$696.6 thousand in 2024, up 1.8% from \$684.1 in 2023. Sales are in early Phase B, Accelerating Growth. A number of indicators including corporate profits, machinery utilization rates, and the US ISM PMI (Purchasing Manager's Index), suggest that this cyclical rising trend will hold.
- Elevated corporate profits will help buffer still elevated interest rates, allowing businesses to invest and keep pace with the expanding macroeconomy. We expect annual Sales will generally rise through 2026. Annual Sales will plateau in 2027, in line with a soft year for the US industrial sector.
- While Sales are avoiding a hard landing, some machinery end markets still face downward pressures in the near term, largely from the lingering effect of interest rates. Construction machinery, auto, heavy-truck and farm equipment markets will undergo further decline to around the middle of this year. Over time the economy will adapt to the reality that rates are unlikely to return to early-2020 lows. Other core markets, such as computers and electronics, will avoid a hard landing this cycle.
- The second half of this decade will generally bring organic market growth for MTI members, but there are still challenges to plan for. Inflation is likely to pick up again and the labor market will remain tight. Policy changes pose a potential risk (both to the upside and downside) and may require additional flexibility to adapt. Plan for these factors but lead with optimism knowing that positive momentum is coming.

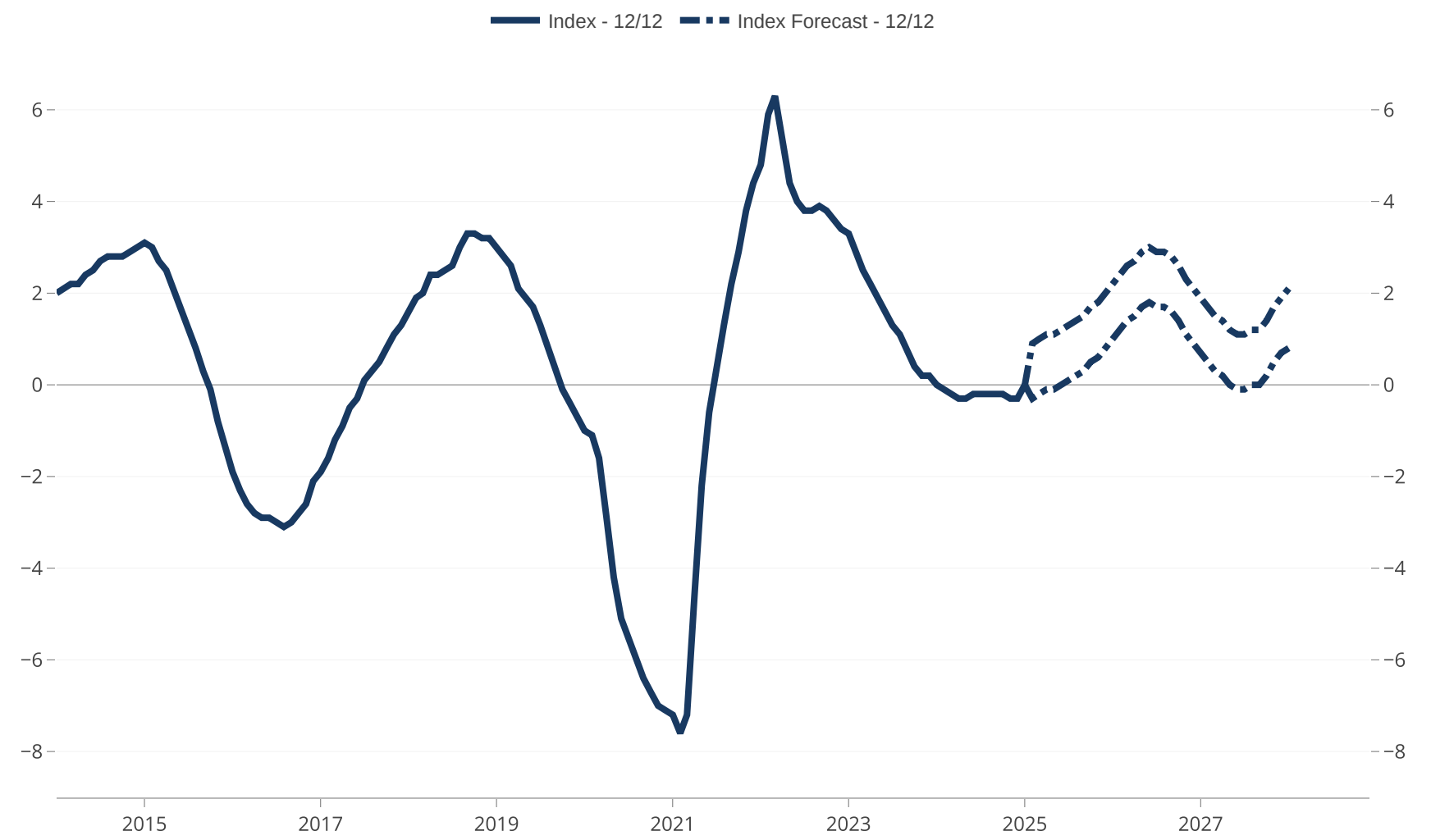
US Industrial Production Index

Production to Rise in Near Term Through at Least 2027; Rates to Remain Elevated

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

Phase A Recovery

Current Indicator Amplitude

- January 2025 Annual Growth Rate (12/12): 0.0%
- January 2025 Annual Average (12MMA), 2017=100: 102.7

Industry Outlook

Year	Annual Growth Rate
2025	1.4%
2026	1.5%
2027	1.3%

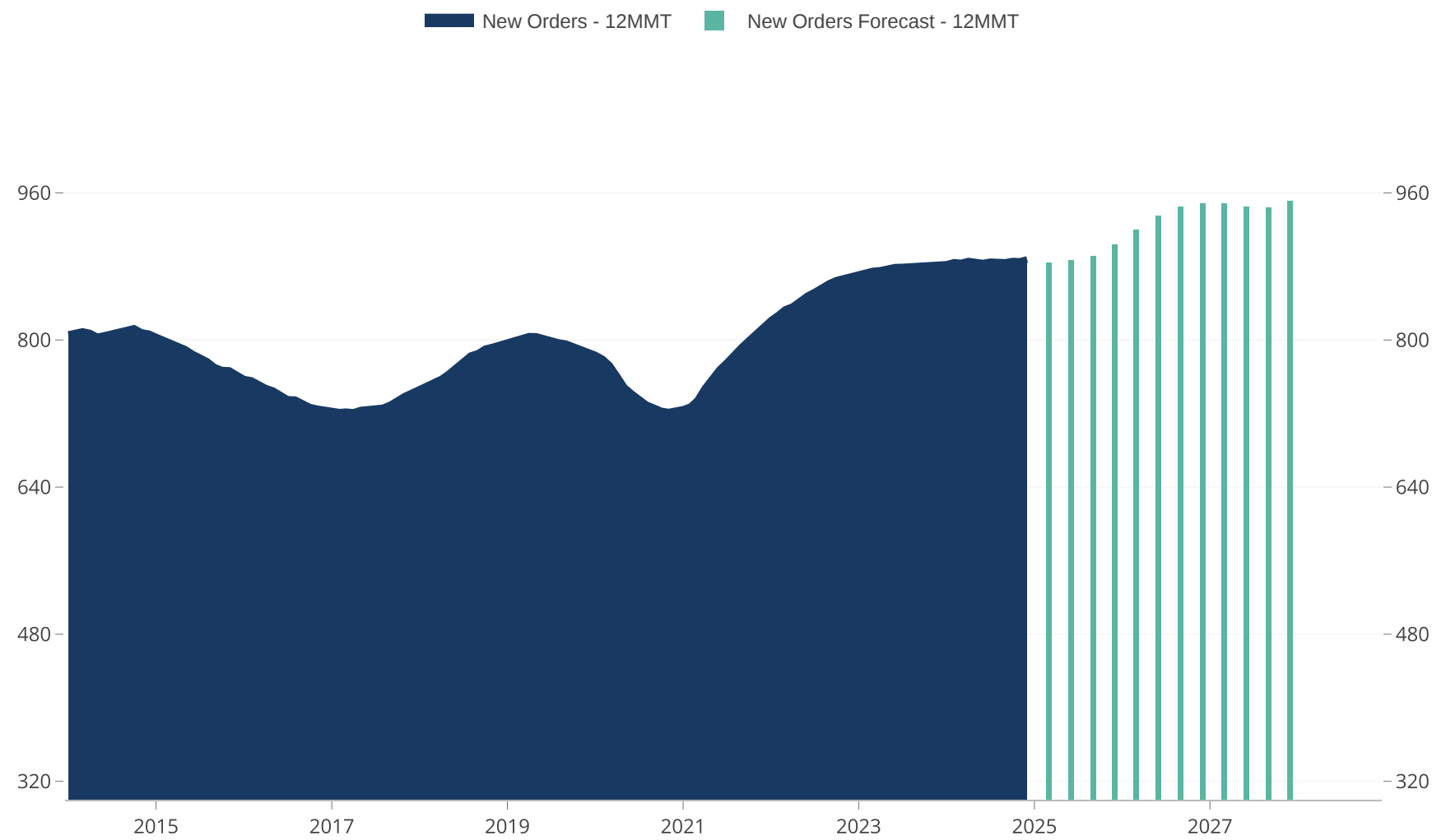
Outlook & Supporting Evidence

- Industrial Production will break out of its plateau this year with the accumulation of nearshoring investments from recent years enabling record highs in the years ahead. Growth will be sluggish at first and then momentum will build into mid-2026. Growth rates will then wane into mid-2027, with a soft landing expected for that cyclical trough.
- Consumers and businesses alike remain in relatively solid financial positions, and rising incomes and elevated corporate profits will support higher spending in the years ahead. Budding momentum in the US Total Industry Capacity Utilization Rate and persistent rise in the ITR Leading Indicator™ support our forecast for cyclical rise in the coming quarters.
- The Federal Reserve is easing monetary policy, but long-term interest rates – a closer match to what businesses and consumers pay – are likely to remain elevated. Downside pressure could linger in interest-rate-sensitive markets. Over time, the market will adjust to a “new normal” for interest rates that will likely be higher than the abnormally low rates of the 2010s and early 2020s.
- MTI members should prepare for market conditions to improve, especially later in the year and in 2026. Do you have the capacity and talent you need? Are you in close communication with your upstream and downstream partners and ready to adapt if tariffs throw you a curve ball?

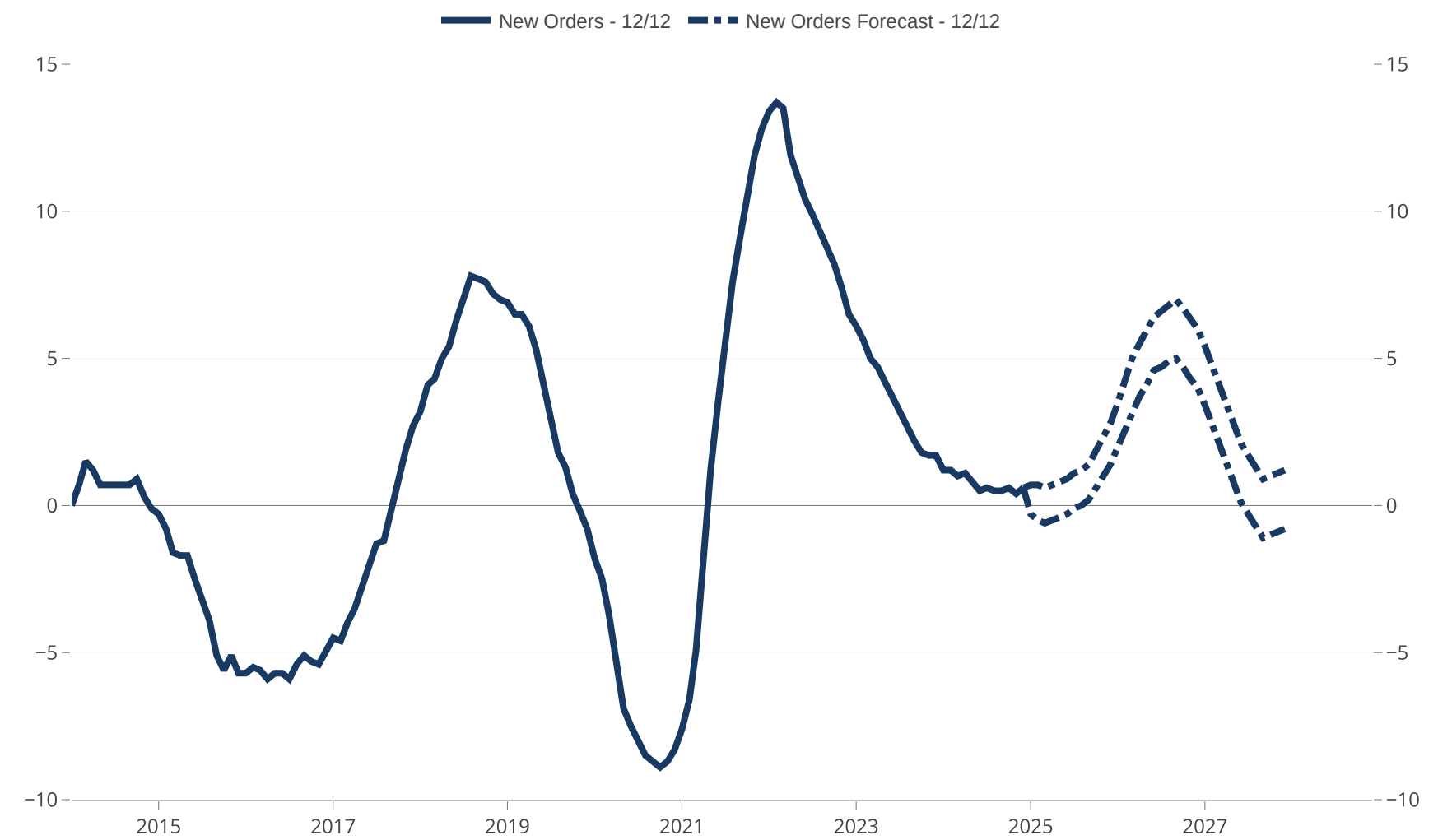
US Nondefense Capital Goods New Orders (excluding aircraft)

Plan for 2025-26 Rise, 2027 Plateau in CapEx; Slight Improvement in Inventory Ratios Is a Good Sign

Annual Total (12MMT)



Annual Growth Rate (12/12)



Current Phase

**Phase C
Slowing Growth**

**Current Indicator
Amplitude**

- December 2024 Annual Growth Rate (12/12): 0.6%
- December 2024 Annual Total (12MMT), Billions of USD: \$887.6

Industry Outlook

Year	Annual Growth Rate
2025	2.1%
2026	5.0%
2027	0.2%

Outlook & Supporting Evidence

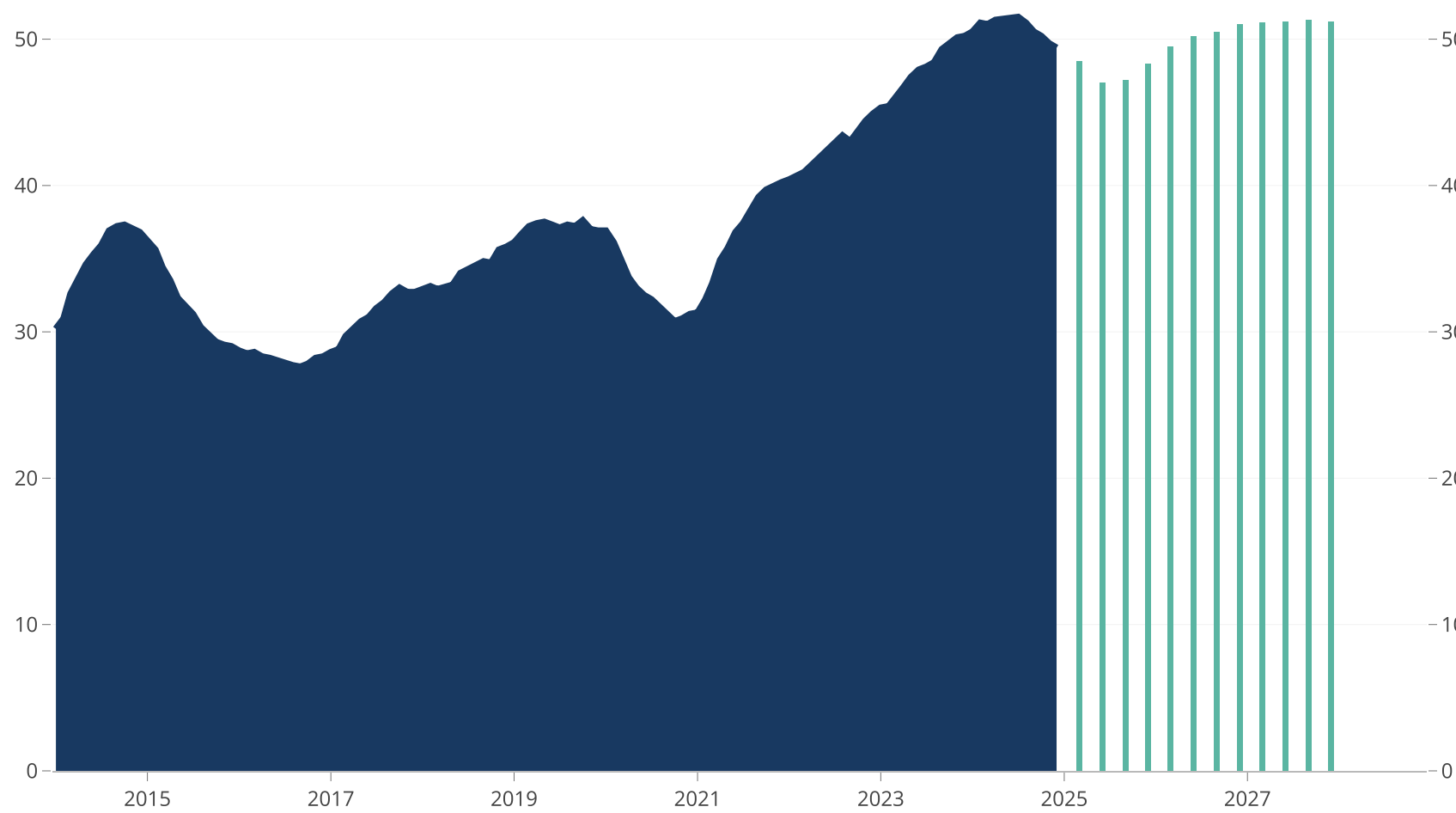
- US Nondefense Capital Goods New Orders (excluding aircraft) totaled a record \$887.6 billion in 2024, but annual growth was just 0.6%. Annual New Orders are plateauing, a culmination of diverging trends within capital goods industries. Featured in this report, Construction Machinery New Orders are below year-ago levels, while Computers and Electronics New Orders are poised to avoid contraction this cycle.
- We expect general rise in annual New Orders through 2026. Rise will be muted in the first half of 2025 and strongest in mid-2026. Mild rise in our system of leading indicators, coupled with inflationary pressures, is likely to drive New Orders spending slightly higher in 2025. We have also seen a rebalancing of inventories, with healthier inventory ratios, in the durable goods space, though machinery is still oversupplied. Still-elevated interest rates are hindering some capex spending, but record-high domestic corporate profits will help some businesses self-finance and minimize borrowing.
- Annual New Orders will plateau around \$950 billion in 2027, with the potential for a brief dip that year. Consequently, 2027 may be a good year to plan process or equipment changes better suited for a slower period to minimize the impact of potential disruptions.
- New Orders are dollar-denominated and will also be boosted by generally rising prices. We are monitoring potential future tariffs that could be inflationary, an upside risk to the outlook.

US Construction Machinery New Orders

Forecast Lowered; New Orders to Decline Through Mid-2025 Then Rise Through 2026 and Plateau in 2027

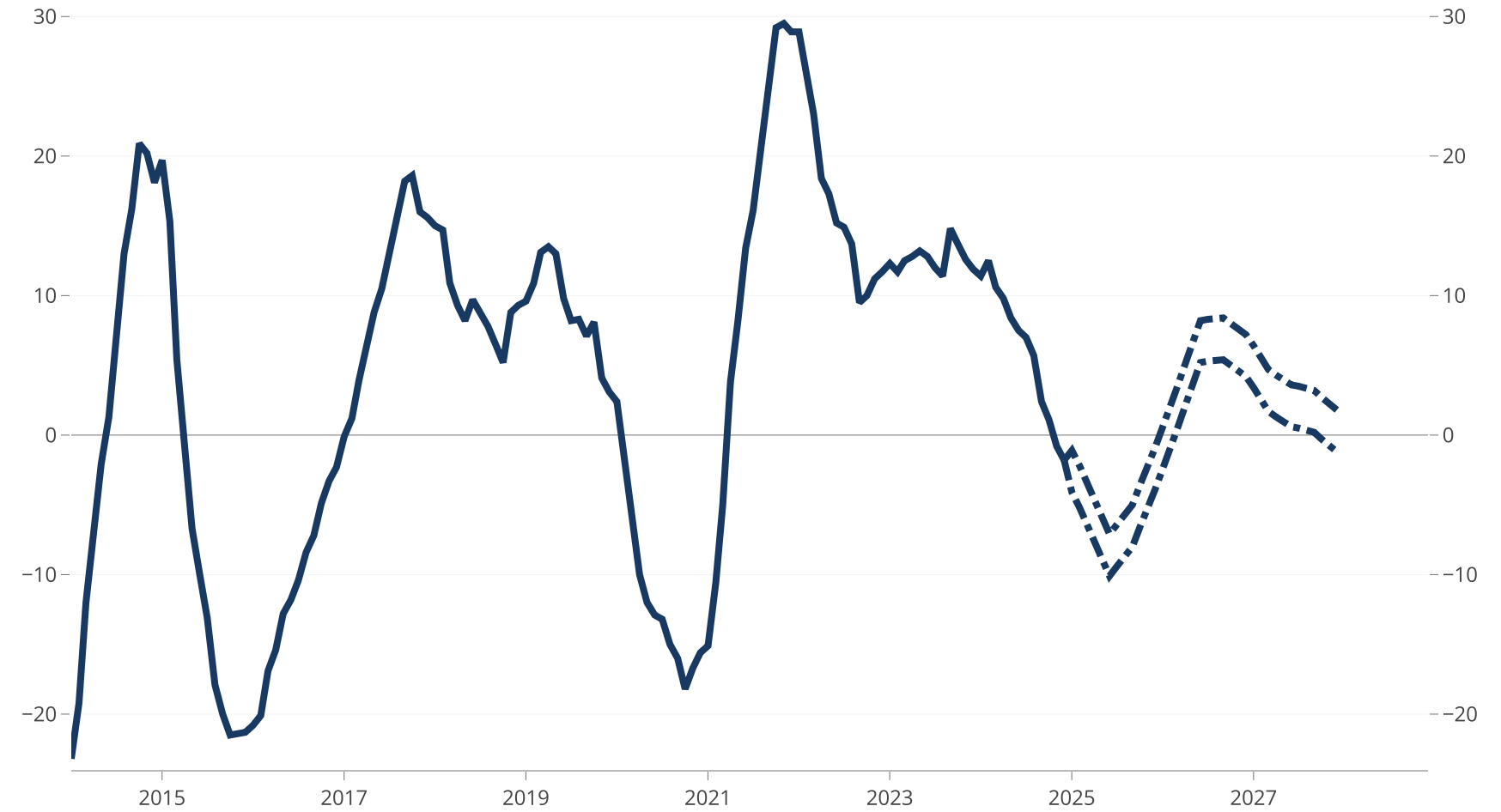
Annual Total (12MMT)

■ New Orders - 12MMT ■ New Orders Forecast - 12MMT

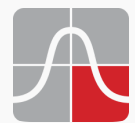


Annual Growth Rate (12/12)

— New Orders - 12/12 - - - New Orders Forecast - 12/12



Current Phase



Phase D
Recession

Current Indicator
Amplitude

- December 2024 Annual Growth Rate (12/12): -1.8%
- December 2024 Annual Total (12MMT), Billions of USD: \$49.4

Industry Outlook

Year Annual Growth Rate

2025	-2.4%
2026	5.7%
2027	0.3%

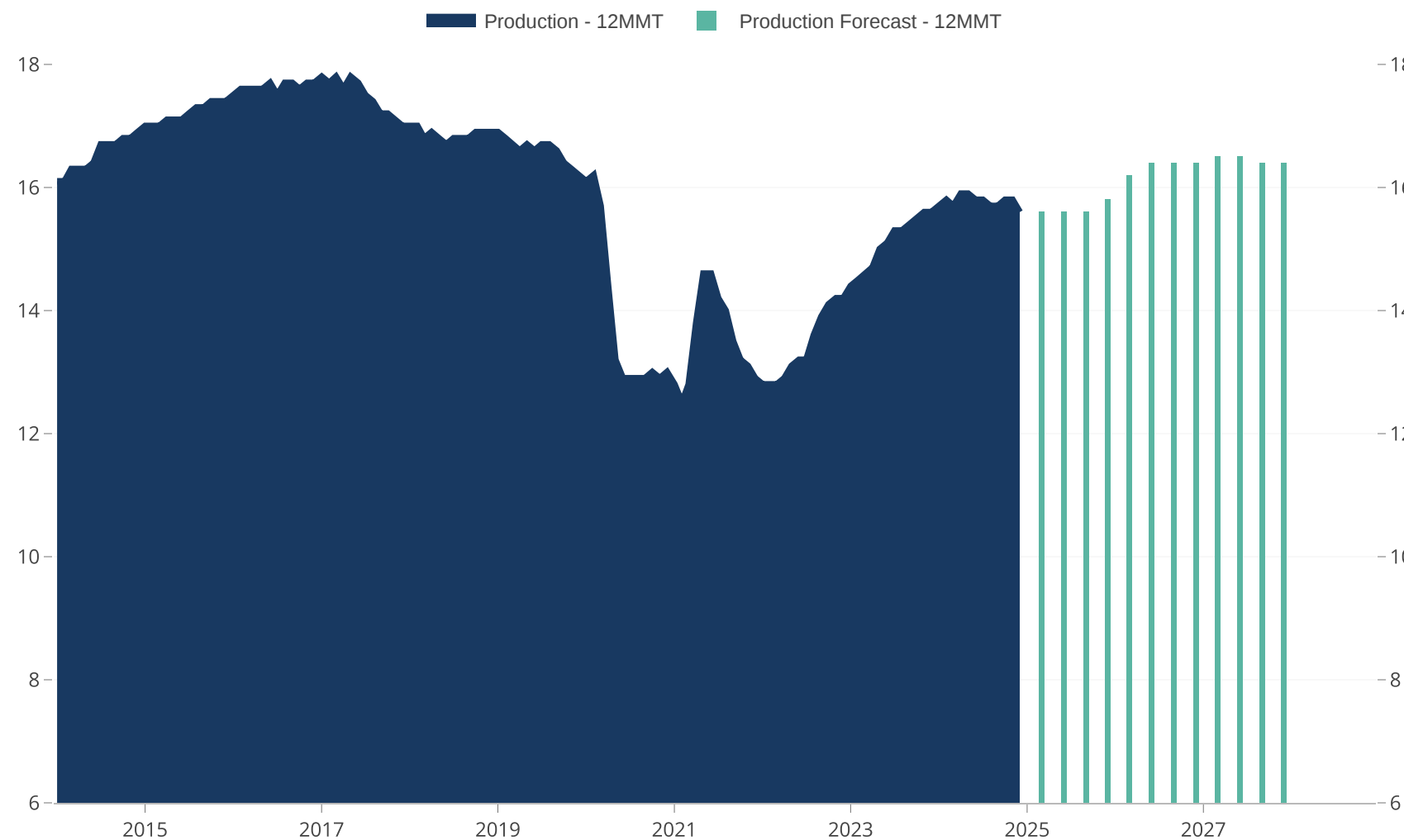
Outlook & Supporting Evidence

- US Construction Machinery New Orders in 2024 were 1.8% below the 2023 level. New Orders entered Phase D, Recession, earlier than anticipated. Given recent data, still-elevated interest rates, and expected upcoming contraction in the nonresidential construction sector, we lowered the outlook by 7.6% for 2025 and 5.2% for 2026. A strong dollar and lingering interest rate effects remain downside risks.
- Annual New Orders will decline in the middle of 2025. US Construction Machinery Exports in 2024 were down 10.7% from 2023 and Imports were down 11.2%. Both are in Phase D, Recession. Still-elevated borrowing costs and a downturn in nonresidential construction following the weaker economic conditions of 2024 are hindering global and domestic demand. Nonresidential construction is below year-ago levels in Europe and is in a protracted recession in China. In the US, nonresidential construction is in late Phase C, Slowing Growth.
- Annual New Orders will generally rise in late 2025 and throughout 2026 as businesses become more accustomed to the higher interest rate environment and the expanding housing market adds to demand. However, New Orders are unlikely to surpass mid-2024 record highs during this period. Annual New Orders will then plateau for much of 2027.

North America Light Vehicle Production

Rising Real Incomes Suggest Modest Growth in Late 2025 and in 2026; Tariffs Present Risks

Annual Total (12MMT)



Annual Growth Rate (12/12)



Current Phase

Phase C
Slowing Growth

Current Indicator Amplitude

- December 2024 Annual Growth Rate (12/12): 0.3%
- December 2024 Annual Total (12MMT), Millions of Units: 15.6

Industry Outlook

Year	Annual Growth Rate
2025	0.9%
2026	3.7%
2027	-0.3%

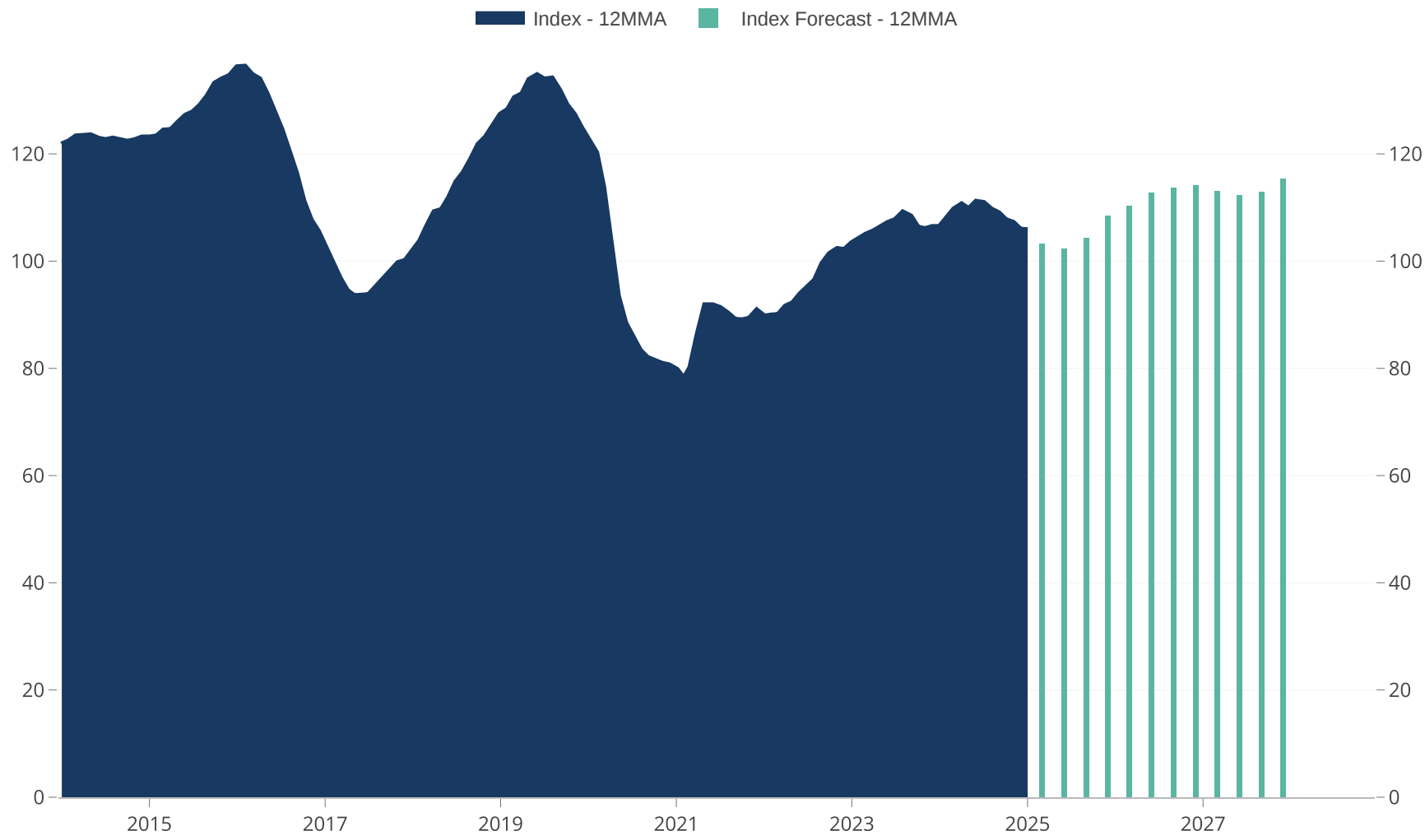
Outlook & Supporting Evidence

- North America Light Vehicle Production totaled 15.6 million units in 2024, 0.3% above 2023. Annual Production will plateau with a downward bias into the middle of this year before rising into the beginning of 2027; most of that rise will be concentrated in 2026. Production in 2027 overall will come in around the same level as 2026.
- Rising real income and ample employment opportunities support our outlook for upcoming growth, but high financing costs are impacting affordability, especially for lower-income consumers. Auto Loan Delinquency Rates are rising higher but remain below the pre-COVID level. Upcoming growth will be modest as a result of these factors.
- If implemented, proposed tariffs on our North American trade partners and on steel and aluminum imports would pose a risk to the auto sector, potentially causing supply chain shifts or higher prices. Tariffs could benefit some but hurt others. Light vehicle components often cross the border multiple times, so this industry could be especially sensitive to tariff outcomes. Encourage communication along your supply chain to understand your exposure to tariff risks (both positive and negative).

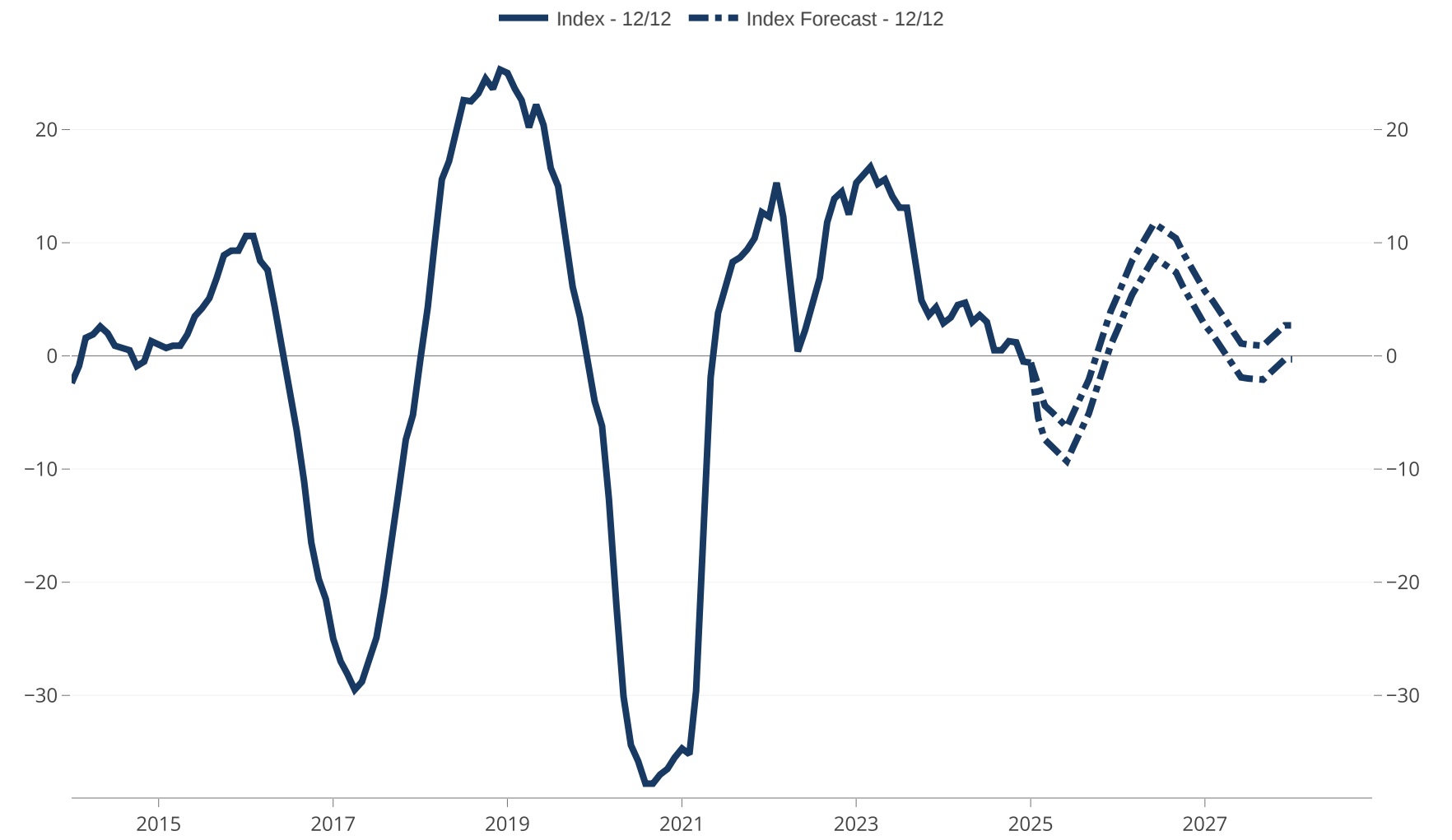
US Heavy-Duty Truck Production Index

Decline Expected to Be Brief, Rate-of-Change Rise in Trucking Indicators Is a Positive Sign

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

**Phase D
Recession**

Industry Outlook

<i>Year</i>	<i>Annual Growth Rate</i>
2025	2.4%
2026	5.1%
2027	1.2%

Current Indicator Amplitude

- January 2025 Annual Growth Rate (12/12): -0.6%
- January 2025 Annual Average (12MMA), 2017=100: 105.7

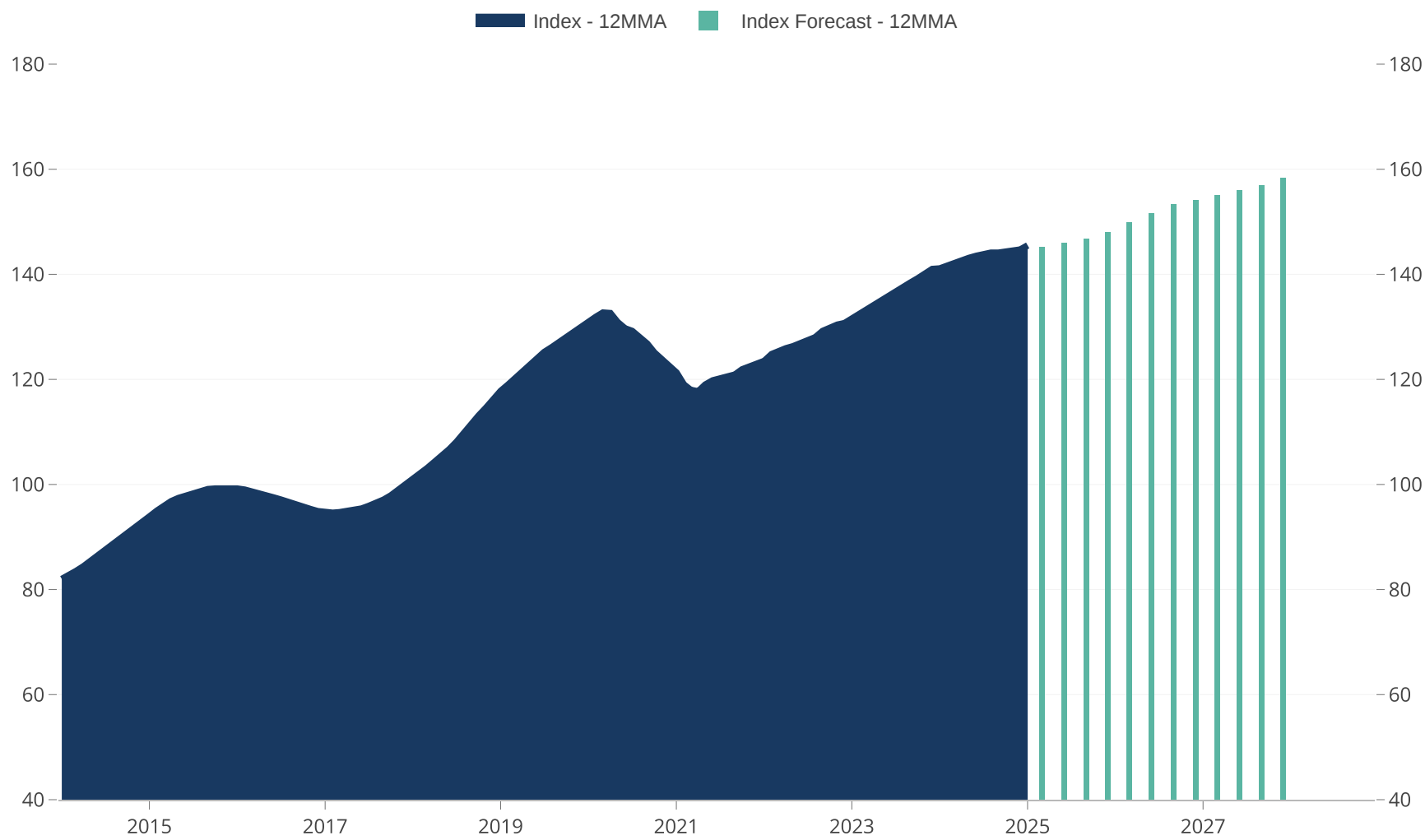
Outlook & Supporting Evidence

- US Heavy-Duty Truck Production in the 12 months through January were 0.6% below the same period one year ago, after transitioning to Phase D, Recession, the month prior.
- Production will decline into the middle of this year. Interest rates remain a downside pressure, but rise in US Total Wholesale Trade will help keep contraction mild. Subsequently, Production will generally rise through 2026. Production will dip briefly in the first half of 2027, but activity will recover by the end of that year.
- Freight rates, volumes, and revenues remain at or below year-ago levels. Still, Phase A, Recovery, for these same metrics support our view that businesses should look to use the current period of weaker activity to prepare for the next rising trend in the heavy truck market.
- The US Wholesale Sales to Inventory Ratio is also rising, suggesting sales activity is beginning to pick up relative to previously bloated inventories as consumers remain relatively resilient. This is a good sign for future freight and truck demand.

US Oil and Gas Extraction Production Index

Production to Rise Through 2027 Supported by Demand From Expanding US and Global Industrial Sectors

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

**Phase C
Slowing Growth**

Current Indicator Amplitude

- January 2025 Annual Growth Rate (12/12): 3.1%
- January 2025 Annual Average (12MMA), 2017=100: 145.5

Industry Outlook

Year	Annual Growth Rate
2025	2.2%
2026	4.2%
2027	2.7%

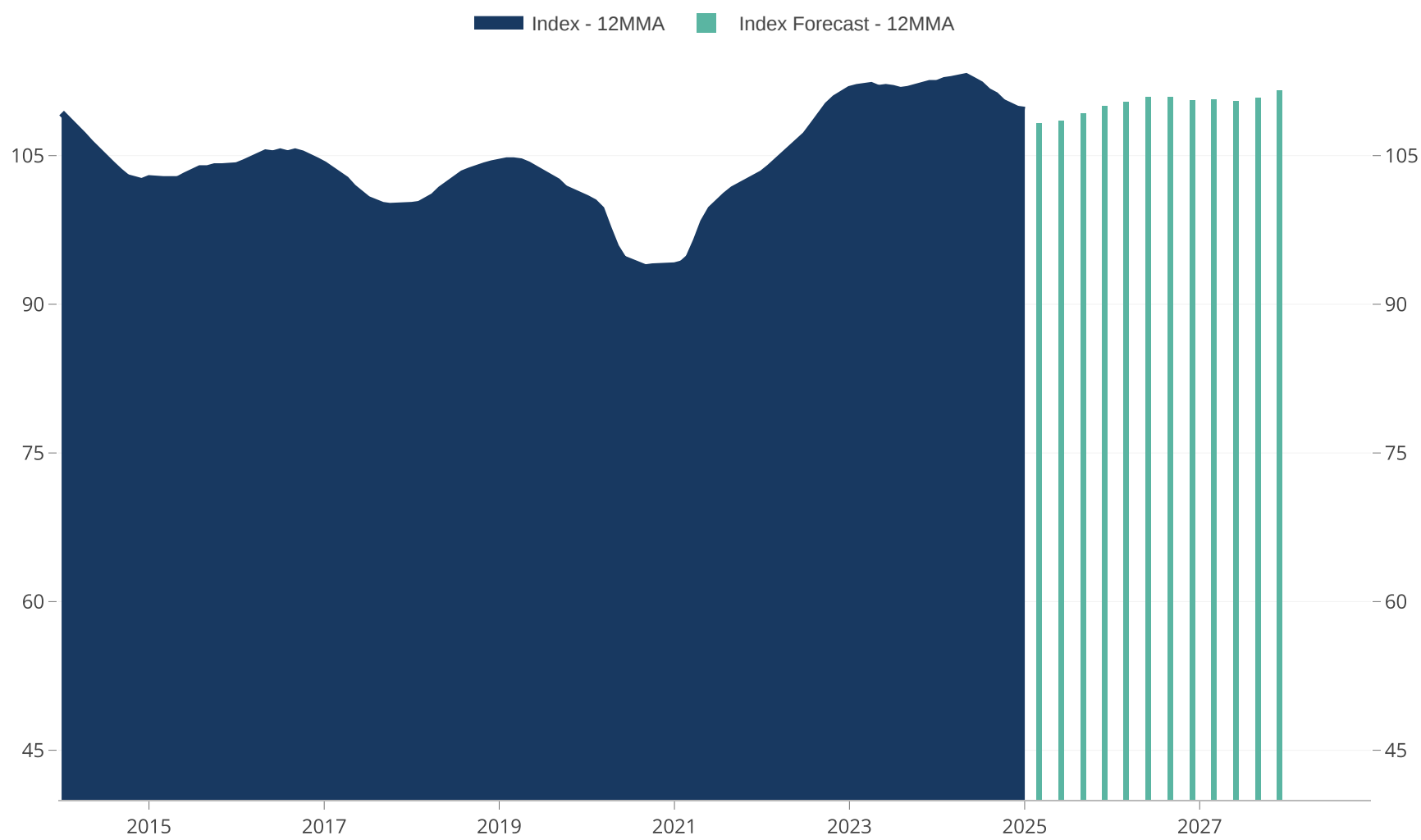
Outlook & Supporting Evidence

- US Oil and Gas Extraction Production in the 12 months through January was 3.1% above the same period one year ago. Oil prices have been trending near \$70 per barrel and, while a number of factors impact pricing, this does suggest that the US and global economies have been absorbing record US oil production relatively well. We expect general expansion in the US industrial sector, as well as industrial sectors of pertinent trade partners such as the EU; this signals that further rise is likely in the coming three years for Production.
- We are forecasting that the Crude Oil Prices quarterly average will gradually rise to the mid-\$80s per barrel over this year. Higher prices could make investing in new wells more attractive. Exploration and drilling were in a recession in 2024, but are showing signs of a tentative recovery trend. Oil and gas firm respondents to the Dallas Fed Energy Survey signal plans for a slight increase in capex in 2025.
- Higher productivity of wells has allowed for record levels of extraction despite the pullback in the rig count and upstream exploration. We expect mild growth for Extraction for much of 2025, but new capacity coming online will lead to higher growth rates for Extraction later this year and in 2026. Growth will slow once again in 2027 as the macroeconomy softens.
- The Trump administration has expressed interest in prioritizing the oil and gas industry. Policy changes could pose a risk to our outlook, and we are monitoring developments accordingly.

US Medical Equipment and Supplies Production Index

Forecast Adjusted; Production to Rise From the Near-Term Through Mid-2026, Then Plateau

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

**Phase D
Recession**

**Current Indicator
Amplitude**

- January 2025 Annual Growth Rate (12/12): -2.4%
- January 2025 Annual Average (12MMA), 2017=100: 109.6

Industry Outlook

<i>Year</i>	<i>Annual Growth Rate</i>
2025	0.7%
2026	0.5%
2027	0.9%

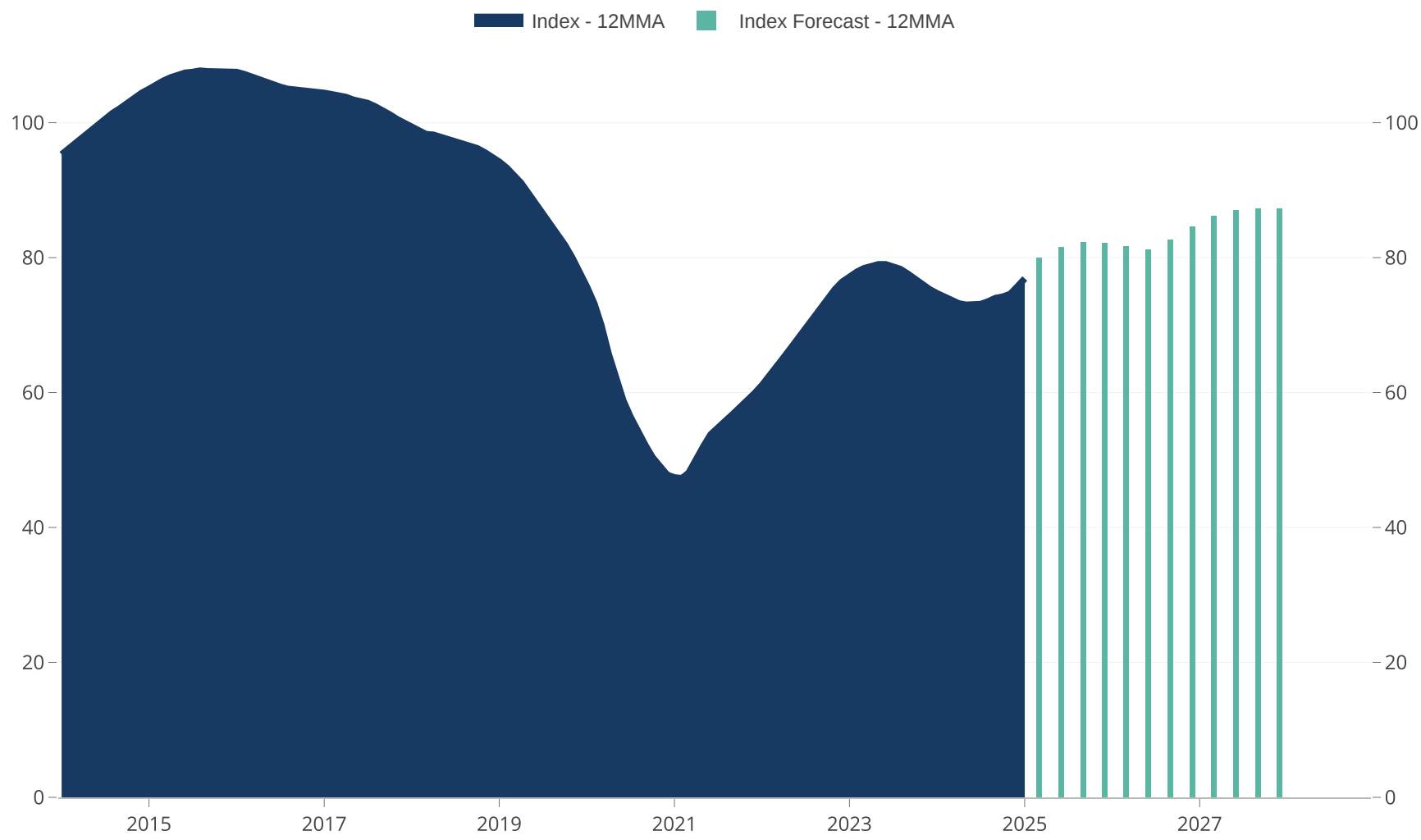
Outlook & Supporting Evidence

- Annual US Medical Equipment and Supplies Production is 2.4% below the year-ago level. We adjusted the forecast to account for a recent downward deviation, but the growth rates for the coming years are little changed.
- Annual Production will reach a low in the near term and then rise into the middle of 2026. Annual Production will plateau through at least 2027. Rise will be muted, as still-elevated interest rates will deter some medical facilities from spending on financed items.
- US dollar strength presents a downside risk to the outlook as extended periods of US dollar strength may make cheaper foreign goods more attractive. However, trends in US Medical and Diagnostic Laboratories Services Revenue point to upcoming rise for Production in the latter half of this year and into at least early 2026.
- The aging demographic and nearshoring initiatives are a solid base for this market in the longer term, and we are unlikely to see any significant decline in at least the next three years.

US Civilian Aircraft Equipment Production Index

Production Accelerating; Expect General Rise With a Mild Dip in Late 2025 to Early 2026

Annual Average (12MMA)



Annual Growth Rate (12/12)



Current Phase

**Phase B
Accelerating
Growth**

Industry Outlook

Year	Annual Growth Rate
2025	5.7%
2026	3.1%
2027	3.2%

Current Indicator Amplitude

- January 2025 Annual Growth Rate (12/12): 2.9%
- January 2025 Annual Average (12MMA), 2017=100: 76.9

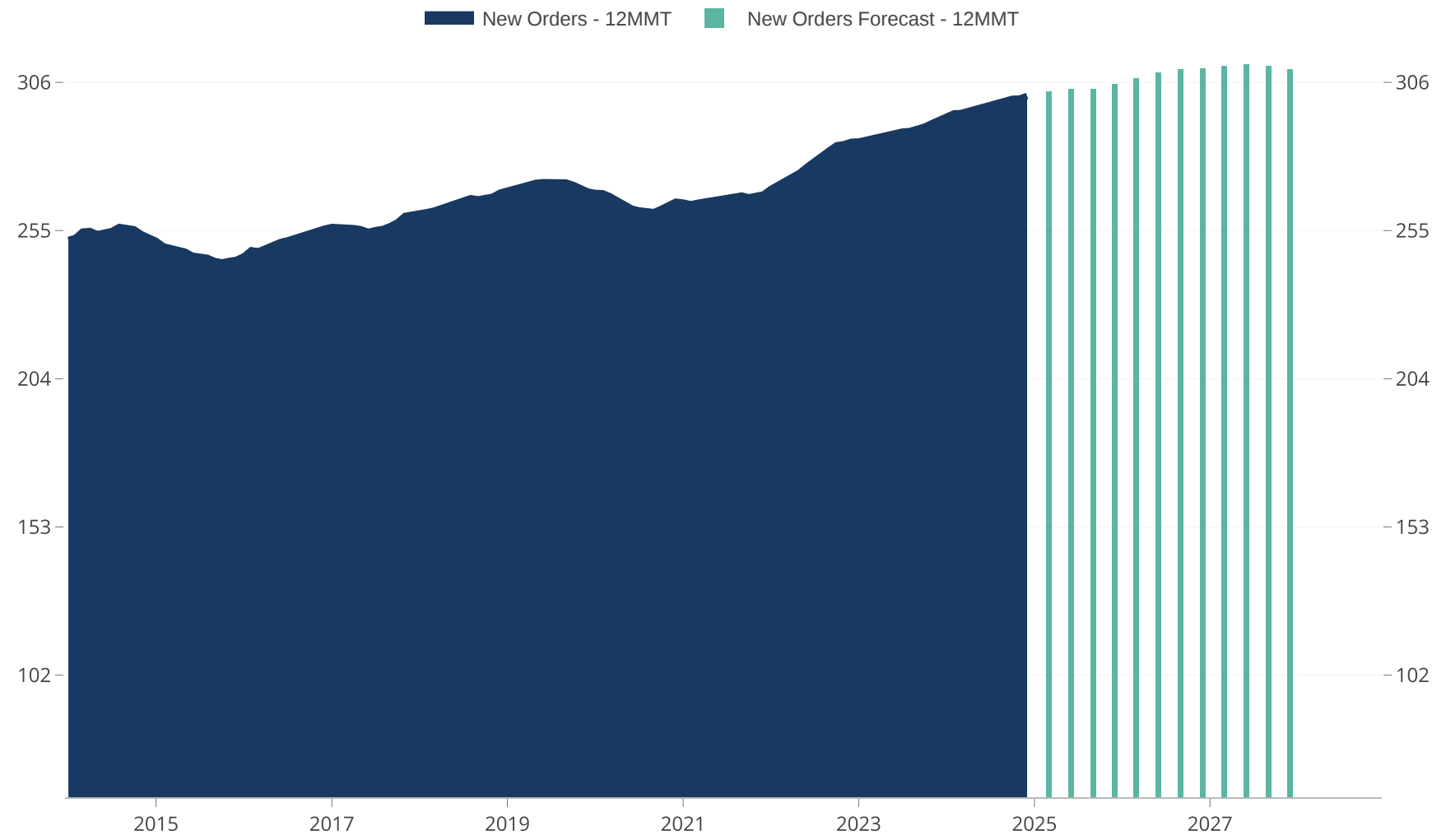
Outlook & Supporting Evidence

- US Civilian Aircraft Equipment Production transitioned to Phase B, Accelerating Growth. Annual Production was 2.9% above the year-ago level in January.
- The first two full months of data since the end of the Boeing machinists' strike show a moderately strong rebound, but Production could track near the lower end of the forecast range as Boeing gets productivity back on track.
- Given pent-up demand, we expect annual Production to rise into the second half of this year. As Production lags the macroeconomy and the industrial sector, a minor dip will take place in the second half of 2025 and into the first half of 2026. Production will then rise through at least 2027.
- Downside risks to the forecast remain, including Boeing regulatory issues and delays, as well as the potential for competition abroad to gain market share.

US Computers and Electronics New Orders

New Orders to Rise Into 2027; Adoption of AI and Data Centers Is Fueling Some Rise

Annual Total (12MMT)



Annual Growth Rate (12/12)



Current Phase

Phase C
Slowing Growth

Current Indicator Amplitude

- December 2024 Annual Growth Rate (12/12): 2.8%
- December 2024 Annual Total (12MMT), Billions of USD: \$301.3

Industry Outlook

Year	Annual Growth Rate
2025	1.3%
2026	1.8%
2027	-0.1%

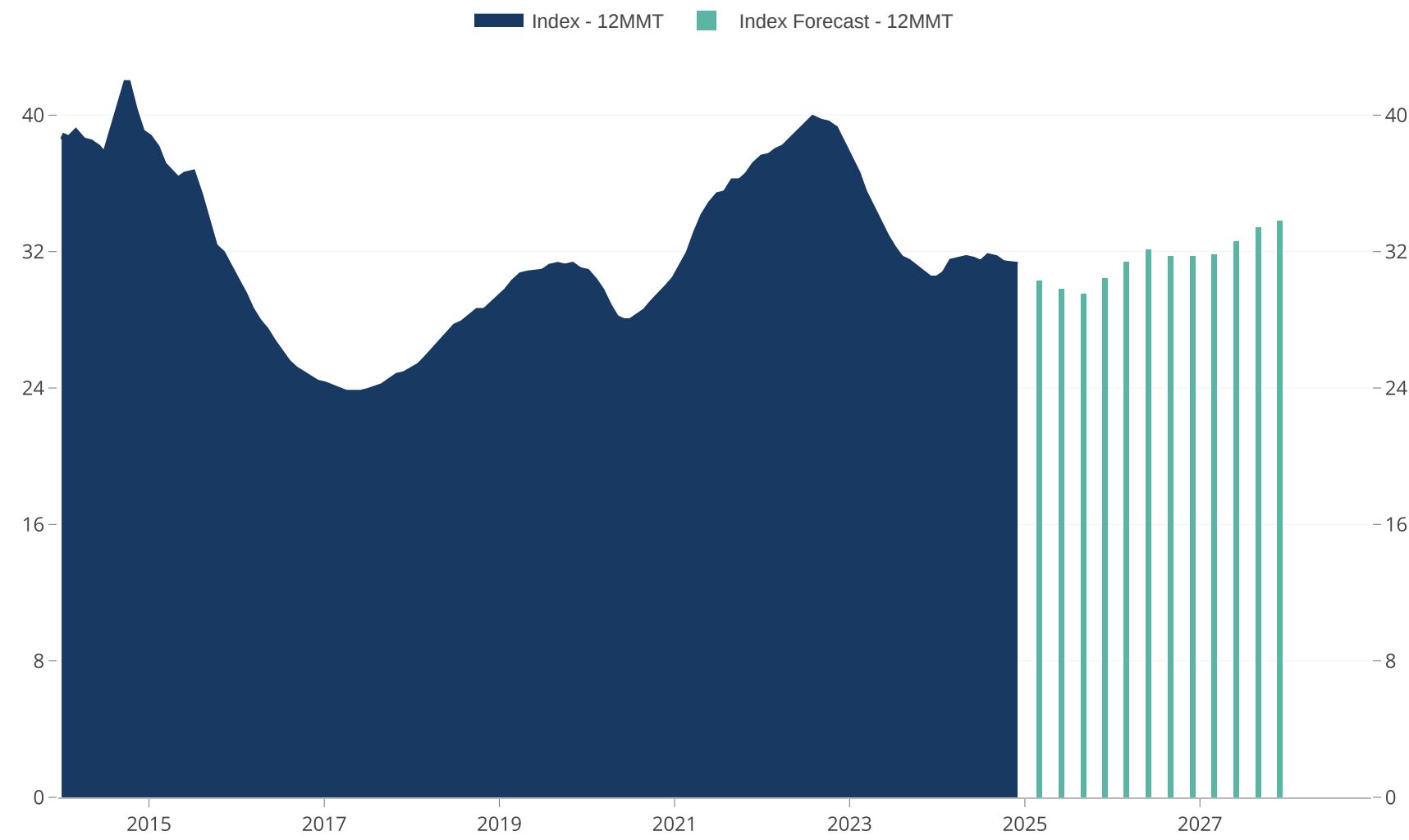
Outlook & Supporting Evidence

- US Computers and Electronics New Orders in 2024 totaled \$301.3 billion, 2.8% higher than in 2023. Annual New Orders are trending at levels not seen in over 15 years. We expect New Orders will generally rise into early 2027, followed by a plateau for the remainder of that year. Expect growth rates to remain below those during the surge in 2022, which was partially boosted by fiscal stimulus.
- The increasing adoption of AI and the surge in domestic data center construction are driving demand for certain computer and electronic goods. Additionally, global demand for computers and electronics is strong; Exports were up 10% in 2024 from 2023.
- The US imports a large amount of computers and electronics from China. Recently enacted tariffs on Chinese imports could help some domestic producers compete in this market.
- MTI members should consider if they can improve efficiency through the adoption of AI or other technological solutions. The labor market will remain tight in the coming years as baby boomers retire.

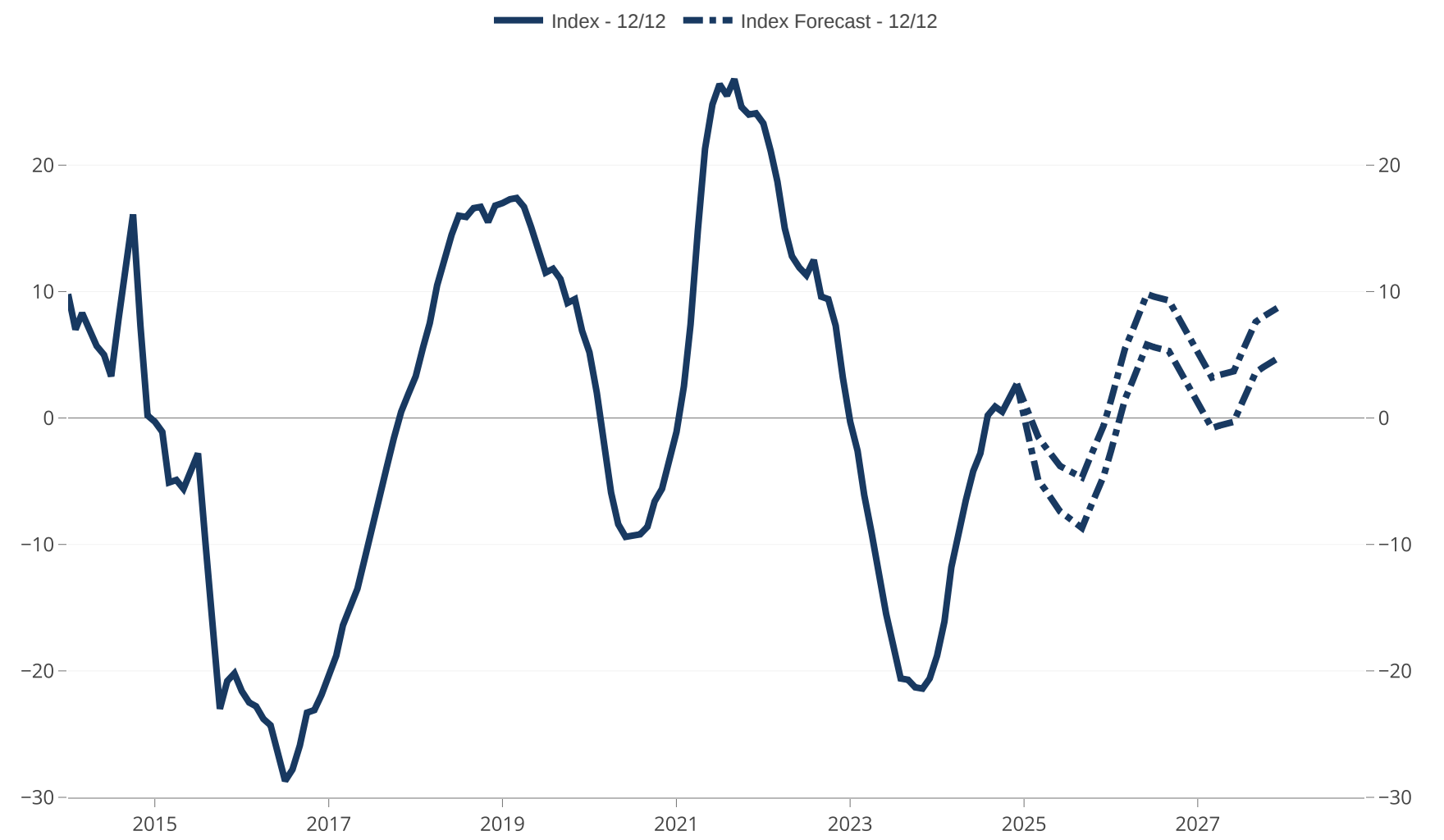
US Farm Machinery Shipments

Forecast Lowered Due to Deteriorating Farmer Incomes; Expect Rise to Take Hold Later This Year

Annual Total (12MMT)



Annual Growth Rate (12/12)



Current Phase

Phase B
Accelerating
Growth

Current Indicator
Amplitude

- December 2024 Annual Growth Rate (12/12): 2.7%
- December 2024 Annual Total (12MMT), Billions of USD: \$31.2

Industry Outlook

Year	Annual Growth Rate
2025	-2.6%
2026	4.2%
2027	6.7%

Outlook & Supporting Evidence

- US Farm Machinery Shipments in 2024 was 2.7% above 2023 levels but are trending relatively flat. The quarterly trend suggests a recent loss of momentum and an upcoming dip back below year-ago levels.
- US Farm Proprietors Income has fallen to less than half the late 2022 peak. Income has been lower due in part to relatively low crop prices. Given low farm incomes and still elevated interest rates, we are anticipating near-term weakness for Shipments.
- We lowered the outlook by 12% for 2025 and 10% for 2026. Decline in annual Shipments will extend into the latter half of this year. The decline will likely be mild given the macroeconomic backdrop of expected growth. Subsequent choppy rise will extend through at least year-end 2027. Annual Shipments will remain well below the 2022 peak during this time, as super-low interest rates are unlikely to return.
- China has imposed a 10% tariff on certain farming machinery sourced from the US. Should this impact demand for Shipments more than anticipated, it could pose a downside risk to the outlook.



US Leading Indicators

Indicator	Direction		
	1Q25	2Q25	3Q25
ITR LEADING INDICATOR™	●	●	●
ITR RETAIL SALES LEADING INDICATOR™	●	●	●
US OECD LEADING INDICATOR	●	●	●
US ISM PMI (PURCHASING MANAGERS INDEX)	●	●	●
US TOTAL CAPACITY UTILIZATION RATE	●	●	N/A

Green denotes that the indicator signals cyclical rise for the economy in the given quarter. Red denotes the opposite.

What It Means for the US Economy

- Indicators are overwhelmingly flashing green for 2025 apart from the US ISM PMI (Purchasing Managers Index), which has waffled in recent months. Volatility in the index is not unprecedented, however, and most signs are pointing toward mild rise in US Industrial Production this year.
- Rising trends in both the US OECD Leading Indicator and the US Total Industry Capacity Utilization Rate are mild, supporting our outlook for industrial sector rise to be somewhat muted, in contrast to the breakneck ascent of the post-COVID period.
- Mildness in rise in the ITR Retail Sales Leading Indicator™ suggests that US Total Retail Sales growth will be consistent and steady, with some, but not all, upward pressure attributable to inflation.

Leading indicators suggest that muted economic growth will be the prevailing trend for 2025. Capitalizing on growth may be tricky, as margins will come under pressure when inflation heats up in late 2025. Look to maximize efficiencies to protect margins. Preparing your supply chain for the potential of rising trade tensions is also advisable.

Market Definitions

US Industrial Production Index

Index of total industrial production in the United States; includes manufacturing, mining, and utilities. Source: Federal Reserve Board (FRB). Index, 2017 = 100, not seasonally adjusted (NSA).

US Nondefense Capital Goods New Orders (excluding aircraft)

New orders for nondefense capital goods, excluding aircraft, in the United States. Includes farm machinery and equipment, construction machinery, mining machinery, nondefense small arms and ordnance, industrial machinery, commercial and service industry equipment, other general purpose machinery, photographic equipment, metalworking machinery, turbine and generator manufacturing, power transmission equipment, pumps and compressors, material handling equipment, electronic computers, computer storage devices and peripheral equipment, communications equipment, nondefense search and navigation equipment, electrometrical equipment, electrical equipment, heavy duty truck manufacturing, railroad rolling stock, nondefense ship and boat building, office and institutional furniture, and medical equipment and supplies. Source: US Census Bureau. Measured in billions of dollars, not seasonally adjusted (NSA).

North America Light Vehicle Production

Passenger car and light-duty truck production (classes 1-3) in the US, Canada, and Mexico combined, including transplants. A passenger car is a road motor vehicle, other than a motorcycle, intended for the carriage of passengers and designed to seat no more than nine persons (including the driver). Source: WardsAuto. Measured in millions of units, not seasonally adjusted (NSA).

MTI Average Monthly Sales

Average Monthly Sales per plant.

US Construction Machinery New Orders

New Orders for construction machinery in the United States. This industry comprises establishments primarily engaged in manufacturing construction machinery, surface mining machinery, and logging equipment. Source: US Census Bureau. NAICS Code: 33312. Measured in billions of dollars, not seasonally adjusted (NSA).

US Heavy-Duty Truck Production Index

Production index for heavy duty trucks in the US. This industry comprises establishments primarily engaged in (1) manufacturing heavy duty truck chassis and assembling complete heavy duty trucks, buses, heavy duty motor homes, and other special purpose heavy duty motor vehicles for highway use or (2) manufacturing heavy duty truck chassis only. Includes trucks weighing 14,000 pounds or more. NAICS code: 33612. Source: Federal Reserve Board (FRB). Index, 2017 = 100, not seasonally adjusted, (NSA).

Market Definitions

US Oil and Gas Extraction Production Index

Includes exploration and extraction of crude petroleum and natural gas; drilling, completing, and equipping wells; operating separators, emulsion breakers, desilting equipment, and field gathering lines for crude petroleum and natural gas; and all other activities in the preparation of oil and gas up to the point of shipment from the producing property. Also includes the production of crude petroleum, the mining and extraction of oil from oil shale and oil sands, and the production of natural gas, sulfur recovery from natural gas, and recovery of hydrocarbon liquids. Source: Federal Reserve Board. NAICS Code: 211. Index, 2017 = 100, not seasonally adjusted (NSA).

US Civilian Aircraft Equipment Production Index

Index for US establishments primarily engaged in one or more of the following: (1) manufacturing aircraft engines and engine parts; (2) developing and making prototypes of aircraft engines and engine parts; (3) aircraft propulsion system conversion (i.e., major modifications to systems); (4) aircraft propulsion systems overhaul and rebuilding (i.e., periodic restoration of aircraft propulsion system to original design specifications). Source: Federal Reserve Board. NAICS Code: 336412,3. Index, 2017 = 100, not seasonally adjusted (NSA).

US Farm Machinery Shipments

Total shipments in the United States includes agricultural and farm machinery and equipment, and other turf and grounds care equipment, including planting, harvesting, and grass mowing equipment (except lawn and garden-type). Source: US Census Bureau. Measured in billions of dollars, NSA.

US Medical Equipment and Supplies Production Index

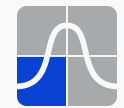
Medical equipment and supplies manufacturing index for the United States. Examples of products made by these establishments are surgical and medical instruments, surgical appliances and supplies, dental equipment and supplies, orthodontic goods, ophthalmic goods, dentures, and orthodontic appliances. Source: Federal Reserve Board. NAICS Code: 3391. Index, 2017 = 100, not seasonally adjusted (NSA).

US Computers and Electronics New Orders

New orders for computer and electronic products (excluding semiconductors) in the United States. Industries in the Computer and Electronic Product Manufacturing subsector aggregate establishments that manufacture computers, computer peripherals, communications equipment, and similar electronic products, and establishments that manufacture components for such products. Source: US Census Bureau. NAICS Code: 334. Measured in billions of dollars, not seasonally adjusted (NSA).

Management Objectives™

Phase A



Recovery

- Scrupulously evaluate the supply chain
- Model positive leadership (culture turns to behavior)
- Start to phase out marginal opportunities (products, processes, people); repair margins
- Perform due diligence on customers and extend credit
- Be on good terms with a banker; you will need the cash more now than in any other phase
- Invest in customer market research; know what they value and market/price accordingly
- Hire key people and implement company-wide training programs ahead of Phase B
- Allocate additional resources to sales and marketing
- Invest in system/process efficiencies
- Make opportunistic capital and business acquisitions; use pessimism to your advantage

Phase B



Accelerating Growth

- Ensure quality control keeps pace with increasing volume
- Invest in workforce development: hiring, training, retention
- Ensure you have the right price escalator; space out price increases
- Maximize your profit margins through differentiation; stand out from the crowd and set yourself apart
- Use improved cash flow to strategically position the business to beat the business cycle
- Expand credit to customers
- Improve corporate governance (rent a CFO; establish a board of advisors or board of directors)
- Communicate competitive advantages; build the brand
- Query users for what they want and what is important to them
- Sell the business in a climate of maximum goodwill

Phase C



Slowing Growth

- Know if your markets are headed for a soft landing or a hard landing
- Cash is king; beware of unwarranted optimism
- Stay on top of aging receivables
- Revisit capital expenditure plans
- Lose the losers: if established business segments are not profitable during this phase, eliminate them
- Use competitive pricing to manage your backlog through the coming slowdown
- Avoid committing yourself to long-term expenses at the top of the price cycle, but lock in revenue
- Go entrepreneurial and/or counter-cyclical
- Evaluate your vendors for financial strength; if needed, look for additional vendors as a safety net
- If the cycle looks recessionary, cross-train key people to prepare for workforce attrition/reduction

Phase D



Recession

- Implement aggressive cost-cutting measures
- Offer alternative products with a lower cost basis
- Perform due diligence on acquisitions while valuations are falling
- Reduce advertising as consumers become more price conscious
- Enter or renegotiate long-term leases
- Negotiate labor contracts
- Consider capital equipment needs for the next cycle
- Tighten credit policies
- Develop programs for advertising, training, and marketing to implement in Phase A
- Lead with optimism, remembering that Phase D is temporary