

READING THE METER

*A look inside a cleaner, safer,
smarter auto industry.*



ALLIANCE FOR AUTOMOTIVE INNOVATION

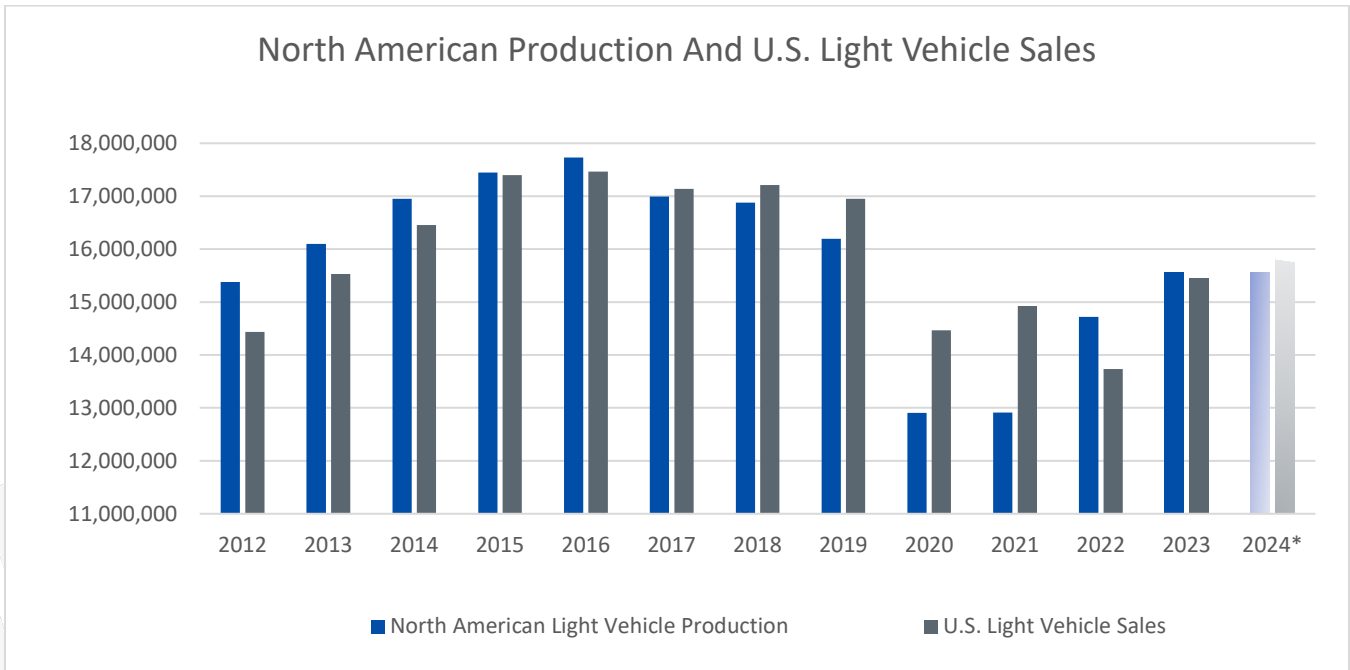
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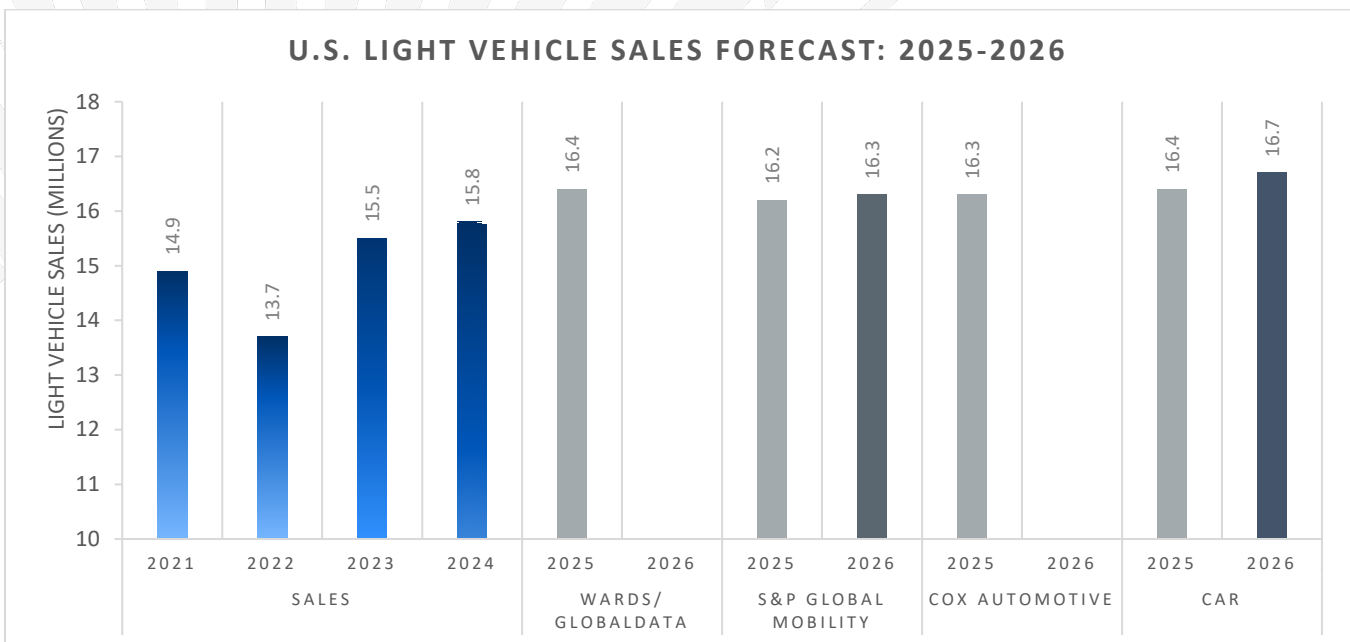
Forecast Meter

Sales & Production Summary and Forecast (Updated 1/7)

| 2023-2024 Sales, ¹ Extended Sales Forecast ² and Production Forecasts ³ | | |
|--|--------------------------------|---|
| | U.S. Sales & Forecasts | North American Production |
| January '23 | 1,033,002 (+4.2% YoY) | 1,195,548 (+12.9% YoY) |
| February '23 | 1,136,332 (+8.7% YoY) | 1,257,482 (+15% YoY) |
| March '23 | 1,365,966 (+8.6% YoY) | 1,442,991 (+6.7% YoY) |
| April '23 | 1,347,159 (+13.1% YoY) | 1,281,626 (+8.6% YoY) |
| May '23 | 1,362,019 (+18.0% YoY) | 1,462,273 (+25.5% YoY) |
| June '23 | 1,370,976 (+19.9% YoY) | 1,387,090 (+13.8% YoY) |
| July '23 | 1,299,199 (+19.9% YoY) | 1,173,342 (+15.6 YoY) |
| August '23 | 1,328,526 (+12.8% YoY) | 1,467,284 (+4.5% YoY) |
| September '23 | 1,331,952 (+13.9% YoY) | 1,353,072 (+7.6% YoY) |
| October '23 | 1,200,286 (+5.7% YoY) | 1,388,720 (+4.5% YoY) |
| November '23 | 1,218,647 (+7.3% YoY) | 1,372,253 (+8.1 YoY) |
| December '23 | 1,433,266 (+17.3 YoY) | 1,082,176 (-2.3% YoY) |
| January '24 | 1,076,047 (-1.3% YoY) | 1,327,765 (+7.8% YoY) |
| February '24 | 1,247,516 (+5.2% YoY) | 1,358,836 (+10% YoY) |
| March '24 | 1,438,012 (+4.6% YoY) | 1,414,502 (-5.7% YoY) |
| April '24 | 1,313,512 (+0.6% YoY) | 1,473,567 (+15.9% YoY) |
| May '24 | 1,429,028 (+0.8% YoY) | 1,485,373 (-1.7% YoY) |
| June '24 | 1,321,932 (-3.4% YoY) | 1,346,584 (-6.1% YoY) |
| July '24 | 1,273,115 (-2.0% YoY) | 1,117,833 (-4.4% YoY) |
| August '24 | 1,419,245 (+3.8% YoY) | 1,428,177 (+32.6% YoY) |
| September '24 | 1,169,908 (-1.4% YoY) | 1,399,608 (+0.8% YoY) |
| October '24 | 1,325,263 (+2.4% YoY) | 1,506,154 (+7% YoY) |
| November '24 | 1,360,060 (+5.8% YoY) | 1,331,155 (-3.1% YoY) |
| December '24 | 1,488,577 (+6.1% YoY) | |
| 2023 Full Year | 15,457,447 (+12.4% YoY) | 16,144,461 (+9.3% YoY) (U.S. 10,611,580) |
| 2024 Full Year | 15,851,070 (+2.2% YoY) | 15.77 (U.S. 10.8M) estimate |



U.S. Light Vehicle Sales Outlook (Updated 1/7)



Wards Intelligence Outlook (1/7)⁴: “An initial outlook at sales in January shows a seasonally adjusted annual rate of 16.0 million units on volume of 1.14 million. But deliveries, among other dynamics, will depend on the level of incentives, consumer confidence – which fell in December after two straight increases – and how

much, if any, pull-ahead volume there was in December out of expectations that the potential for tariffs and elimination of EV credits could inflate prices in 2025.”

North American Production & Inventory Outlook (Updated 1/7)

Wards Intelligence Production Outlook (1/7)⁵: “A stronger-than-expected build in November balanced out a minor downward revision to October’s final output, as well as a cut to December’s outlook, keeping Q4 North America output tracking to roughly the same total as month-ago’s revision.

“The revision to Q4 leaves the period tracking to a 1.0% year-over-year decline, while the first look at Q1-2025 projects a 3.0% drop from the year-ago quarter. A drop in Q1-2025 output would be the third straight decline which began with Q3-2024’s 4.2% downturn.

“Fourth-quarter production of all vehicles – light and medium-/heavy-duty trucks – is tracking to 3.836 million units, down from year-ago’s 3.876 million. Production in November totaled 1.331 million units, 3.1% below same-month 2023, but the total was 32,200 units above month-ago’s projection for the period.

“The Q4 projection puts calendar-year 2024 output at 16.063 million units, 0.7% below 2023’s 16.176 million.

“Excluding medium- and heavy-duty trucks, North America light-vehicle output in 2024 will total 15.493 million units, 0.6% below 2023’s 15.589 million. U.S. light-vehicle production is tracking to 10.237 million, down 0.7% from 2023’s 10.309 million.

“First-quarter 2025 production of all vehicles is forecast to total 3.977 million units, well below like-2024’s 4.101 million. Excluding the big trucks, light-vehicle production is forecast to total 3.850 million in Q1-2025, down 2.5% year-over-year.

“The 2024 calendar-year total also was shaved by a reduction in Tesla’s Q3 total, which is initially estimated before a final revision when the manufacturer reports quarterly global output. Tesla’s Q3 output was cut 48,900 units, with the final estimate totaling 153,170 units, 3.1% above Q3-2023.

“With sales in the U.S. picking up strength in Q4, including a good chance December finishes the year on an especially high note, there is upside to the Q1-2025 production outlook. Demand is expected to fall off somewhat from the Q4-2024 gains, but the drain on inventory could be enough to cause an uptick in production.

“If the U.S. economy remains fundamentally solid, North America production should resume growth in the second half of 2025, if not sooner.”

Wards Intelligence Inventory Outlook (1/7)⁶: “Inventory growth continues to slow, as the decline was more than the historically typical 4.0% November-to-December drop. Also, the year-over-year gap has fallen every month since 48.9% in July and is the smallest since August 2022, when inventory was 18.8% above the year-ago period.

“Inventory control management through production slowdowns mainly explains the above-average drop in inventory from the prior month. (December inventory always falls from November because of end-of-year holiday-related production shutdowns at most assembly plants, plus December tends to be a much stronger month for raw sales volume than November, pulling more stock off dealer lots.)

Production slowdowns for the U.S. market are expected to continue in Q1-2025, further slowing inventory growth, which in turn could cap sales gains.

“Wards Intelligence/GlobalData forecast Q1-2025 light-vehicle production in North America – which supplies nearly 80% of the vehicles sold in the U.S. – to decline 3% year-over-year. The Q1 forecast follows basically flat year-over-year output in Q4-2024 and a 4% drop in Q3.”

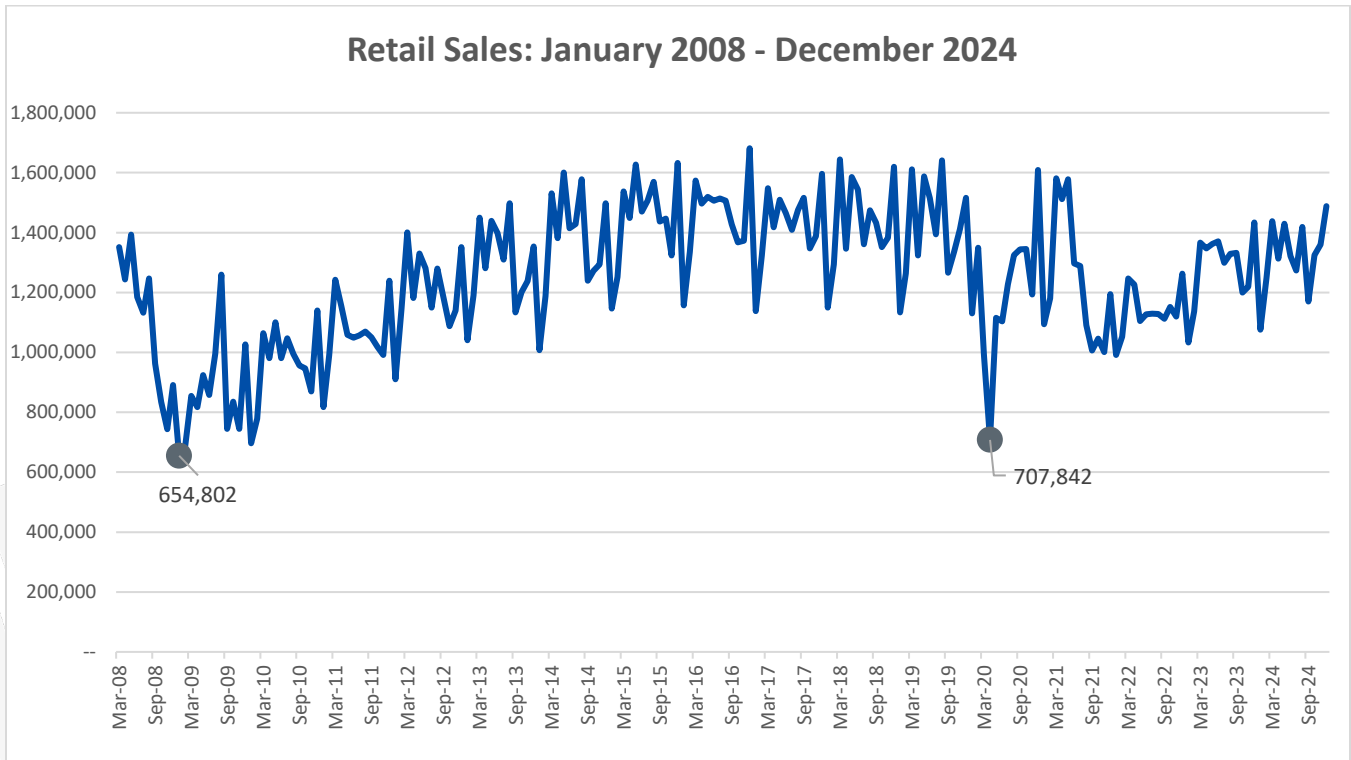
S&P Global Mobility Outlook (1/7)⁷: “North America: The outlook for North America light vehicle production was increased by 23,000 units and reduced by 173,000 units for 2024 and 2025, respectively (and reduced by 238,000 units for 2026). The short-term outlook for light vehicle production in North America 2024 was revised higher by 0.1% with the year expected to total 15.5 million units. Stronger than expected production results were fueled by increases that happen to center on vehicles with currently excessive inventory levels. The incoming Trump administration will mark a return to the predictably unpredictable with policies that are expected to influence overall demand and challenge vehicle mix assumptions. The impact is expected to be less intrusive in the short term with greater risks to the mid- and long-term forecasts with higher inflation resulting in interest rates remaining elevated for a longer period. The outlook for regional production in 2025 was revised down 1.1% totaling 15.1 million units. Reductions are broad-based with cuts at the Detroit 3 most prominent given the need to adjust production to align to demand and reduce their continued excessive inventory levels. Continuing the downward revisions, production in North America for 2026 was revised down 1.5% totaling 15.34 million units. This latest outlook would have both 2025 and 2026 production levels below 2024 amid the challenges within the industry.”

Market Meter

U.S. Light Vehicle Sales (Updated 1/7)

Monthly Sales (Updated 1/7)

This chart helps to put into context the monthly retail sales due to the COVID pandemic and showing the relative drop in sales compared to the 2008 financial crisis.



December Sales (Updated 1/7)

WardsIntelligence®: “U.S. light-vehicle sales ended 2024 on a comparatively strong note, with the seasonally adjusted annual rate totaling 16.8 million units, highest since 17.0 million in May 2021.

“Although there are some results still estimated for all or part of the fourth quarter, sales in 2024 totaled 15.851 million units, up 2.2% from 2023’s 15.502 million, and highest for any year since 16.961 million in 2019.

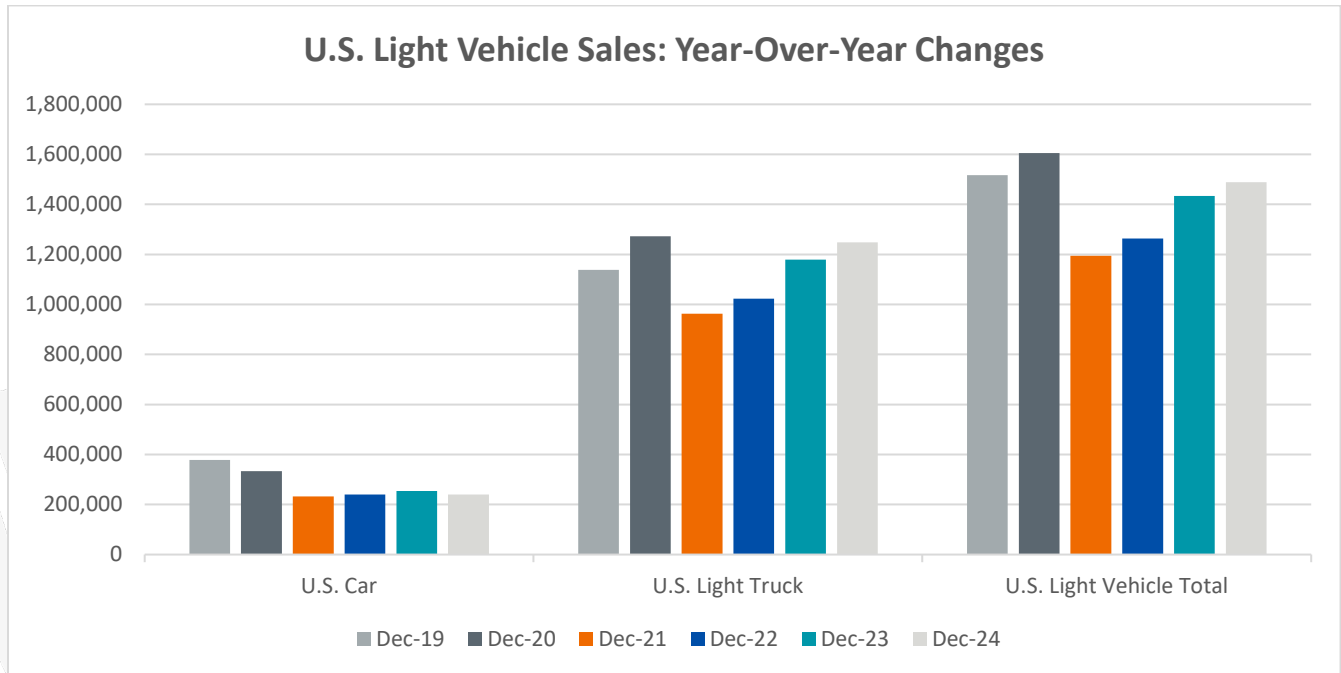
“Fourth-quarter volume totaled 4.193 million units, 7.7% above Q4-2023. The Q4 increase, plus a 4.8% gain in Q1-2024, more than offset declines of 0.8% in Q2 and 2.3% in Q3. The Q4 SAAR was 16.5 million, well above the 15.6 million posted in both the prior period and October-December 2023, and the highest for any quarter since 16.9 million in Q2-2021.

“Generally, the Q4 rebound was due to rising inventory, increased retail incentives and lower interest rates.

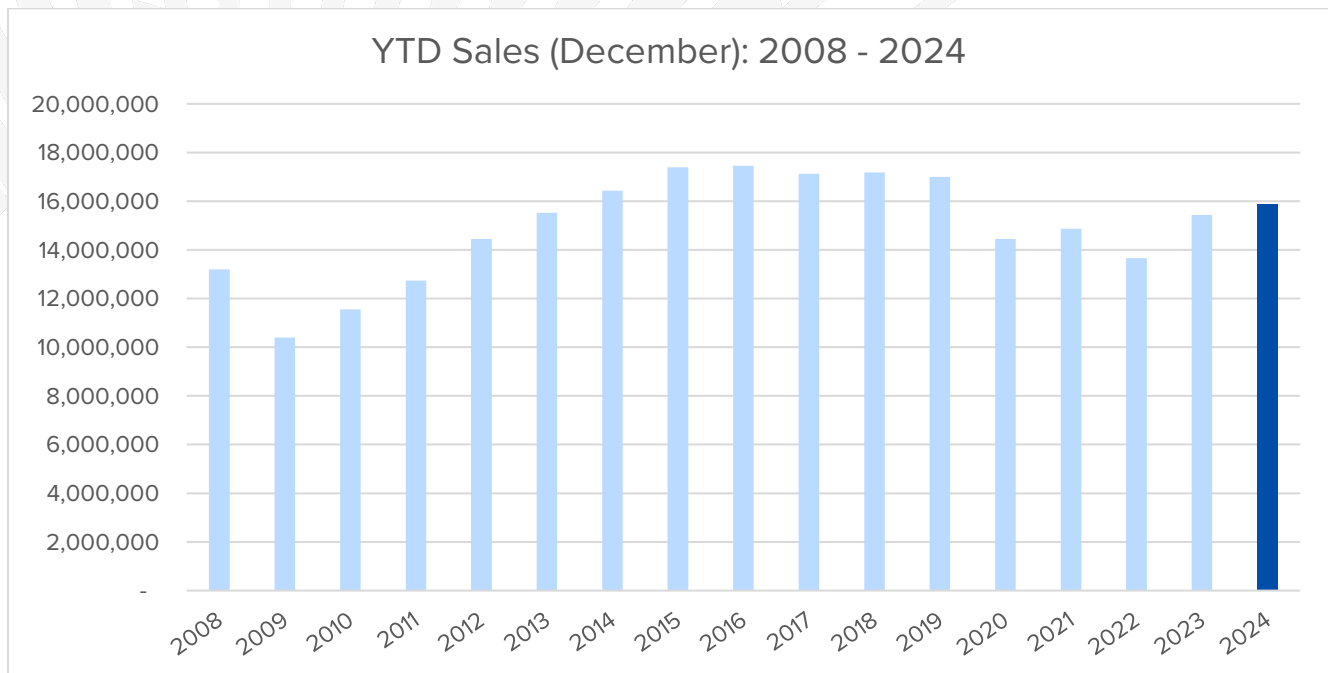
“There also could have been some pull-ahead volume of electric vehicles due to the threat that government retail inducements will be eliminated, or reduced, in 2025 by the incoming Administration. Sales of battery-electric vehicles in December rose 13.2% year-over-year based on DSRs, which was higher than the 6.8% gain they recorded over the entire year – 1.244 million units vs. 1.164 million in 2023.

“Retail sales in December were estimated at 1.30 million units, up 13.1% (based on DSRs) from like-2023. Fleet deliveries were estimated at 191,000, down 25% from the year-ago month.

“For entire 2024, retail is pegged at 13.3 million units, 4.6% above 2023’s 12.7 million, while fleet was estimated at 2.6 million, 8.2% below the prior year’s 2.8 million.



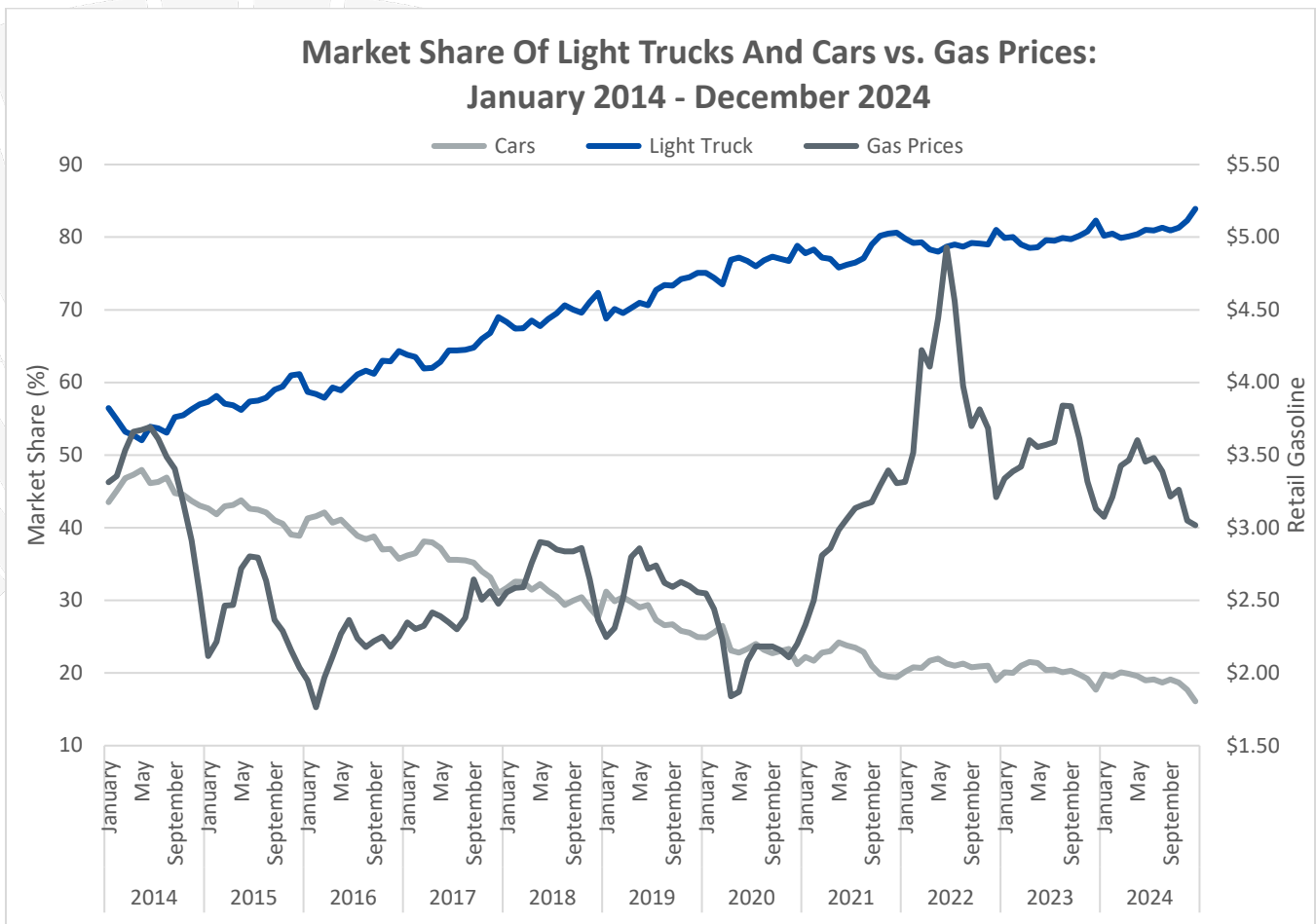
Calendar year-to-date sales through totaled 15.85 million units, up 2.2% from 2023’s 15.5 million.



Segments vs. Gas Prices (Updated 1/7)

Monthly Sales For December: Light trucks accounted for 84 percent of sales in December, up more than 1 percentage points from the market share a year ago and the highest on record. Compared to the same period in 2023, sales of cars are down 14,000 units, and down more than 137,000 from December 2019, when cars comprised 25% of the market as opposed to the 16 percent of the market passenger cars have now.

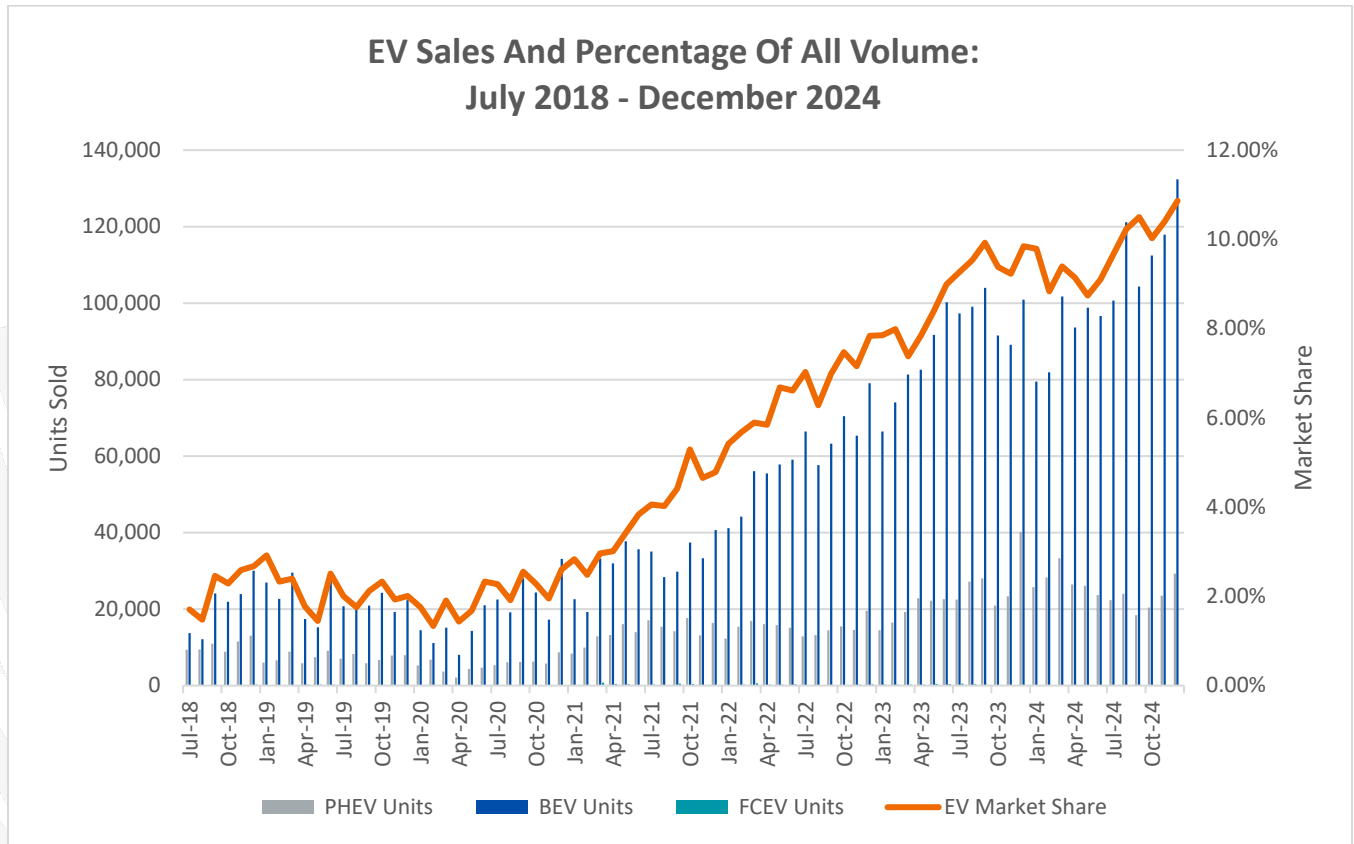
Historic Perspective: The upward trend in the popularity of light trucks over cars has been steady since 2013, when only 2% of annual market share separated the two segments.⁹ and gas was over \$3.00.¹⁰ a gallon. As fuel prices dropped below the \$3.00 mark in mid-September 2014, light truck sales began to take off. Gas prices since have averaged only \$2.92 a gallon (through July 2024) and when combined with increased fuel economy for light trucks, an increase of 4 mpg since 2013, the perfect conditions existed to continue fueling light truck market growth.¹¹



EV Powertrain Sales (Updated 1/7)

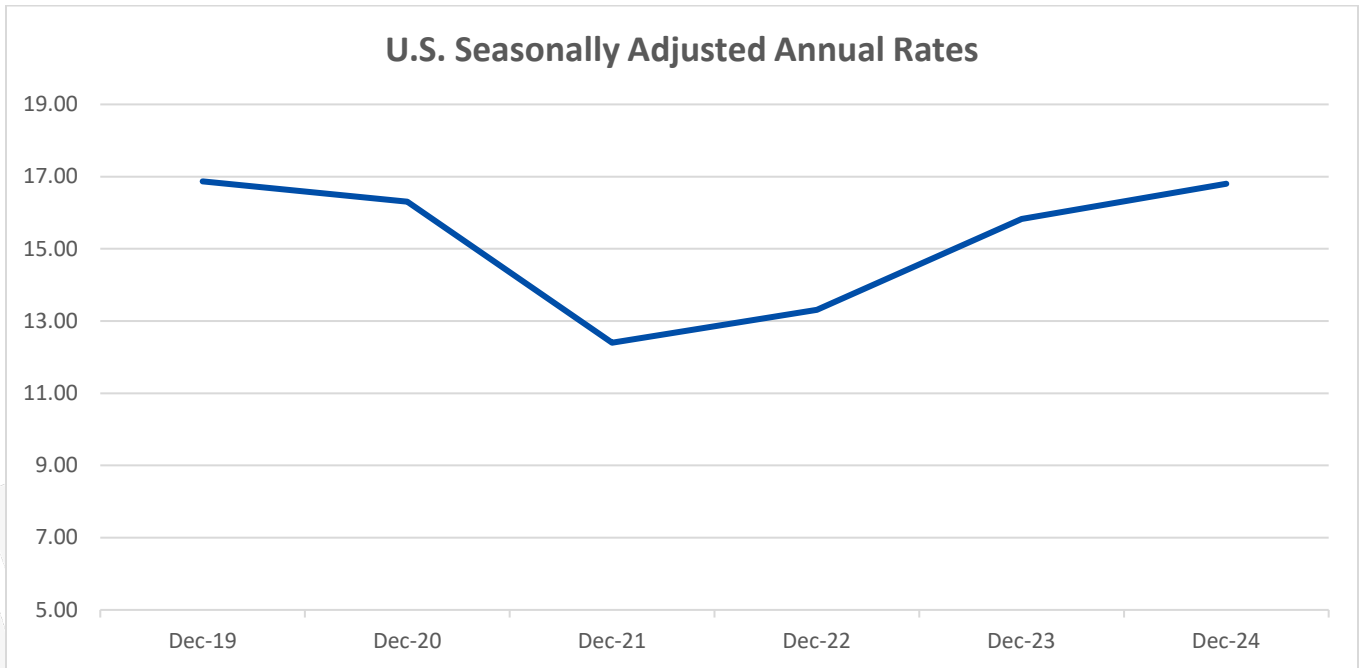
Sales of electric vehicles (BEV, PHEV, & Fuel Cell) accounted for 10.9 percent of total vehicle sales in December 2024 (161,742), per Wards estimates. The market share and volume are all time highs. Market

share increased 0.46 percentage points (pp) from November 2024. December's EV market share is up 1.0 pp from a year ago. Sales of battery electric vehicles led the way for EVs, accounting for 8.9 percent of total sales, up 1.9 pp from December 2023. Plug-in hybrids accounted for 2.0 percent, down 0.8 pp from the same time last year.¹²



Seasonally Adjusted Annual Rates (Updated 1/7)

WardsIntelligence¹³: “U.S. light-vehicle sales ended 2024 on a comparatively strong note, with the seasonally adjusted annual rate totaling 16.8 million units, highest since 17.0 million in May 2021.”



Average Transaction Price (Updated 1/7)

J.D. Power (Updated 1/7)¹⁴: “The average retail transaction price for new vehicles is up marginally from a year ago, trending toward \$46,258—up \$52 or 0.1%—from December 2023. . . . Manufacturer discounts are continuing to increase. The average incentive spend per vehicle is expected to grow 30.7% from December 2023 and is on track to reach \$3,442. Expressed as a percentage of MSRP, incentive spending is currently at 6.6%, an increase of 1.4 percentage points from a year ago. Spending increased by \$98 per unit from November 2024.”

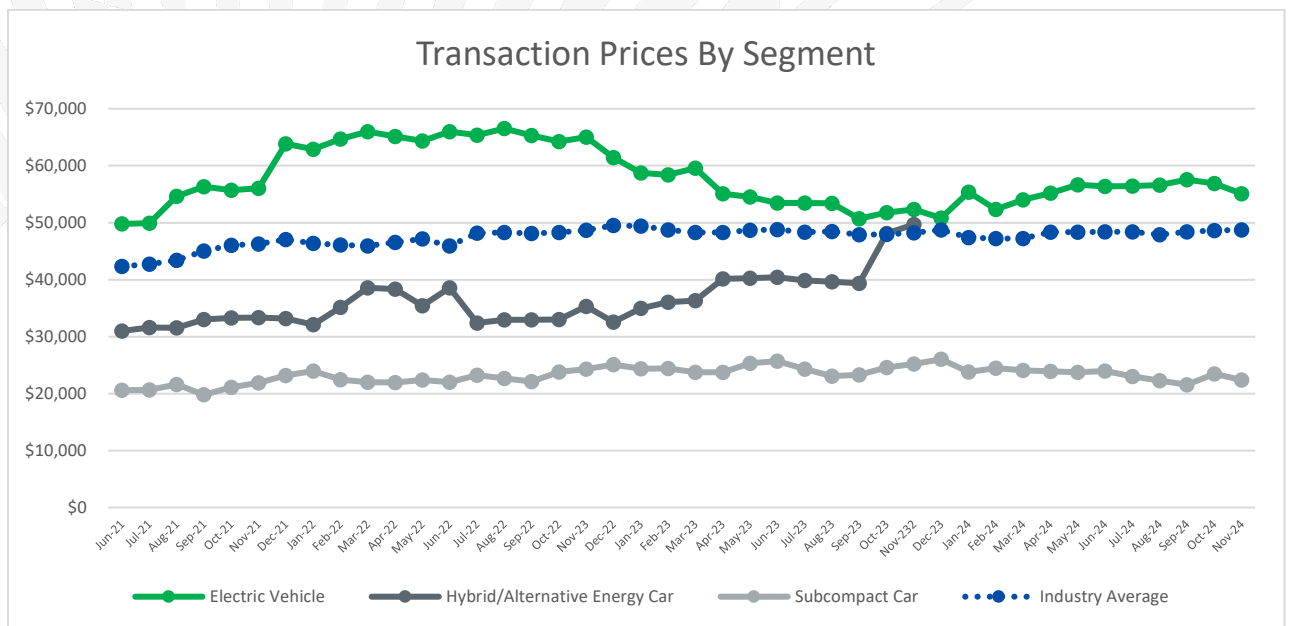
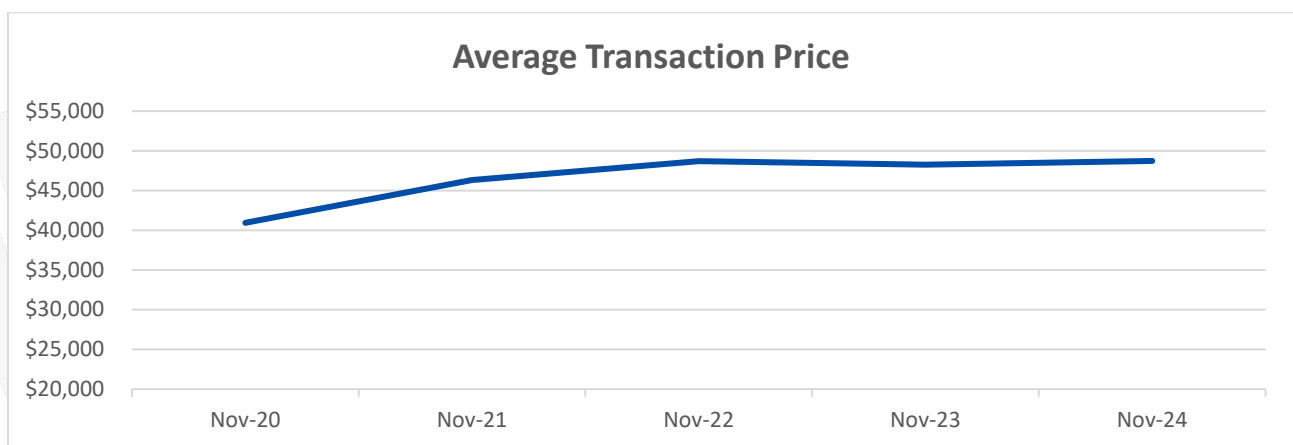
Kelley Blue Book (November)¹⁵: New-vehicle prices in November climbed higher year over year for the second straight month, according to data from Kelley Blue Book released today. Last month, the average transaction price (ATP) for a new vehicle was \$48,724, an increase of \$699, or 1.5%, from November 2023. The November ATP was also higher by \$720 compared to the downwardly revised ATP in October of \$48,004.

“Sales incentives for new vehicles in November averaged 8.0% of ATP, up from 7.8% in October. Incentives have now increased for five straight months. One year ago, in November 2023, incentive spending was equal to 5.3% of ATP. Incentives last month were higher by more than 50% year over year (approximately \$1,300), while vehicle prices increased by only 1.5% (approximately \$700), helping improve affordability and likely boosting vehicle sales.

“Transaction prices in November, at \$48,724, were at the highest point of 2024 and are up 2.3% since January. In any given year, vehicle transaction prices typically peak in December. ATPs reached an all-time high of \$49,926 in December 2022. Last December, the Kelley Blue Book ATP estimate was \$49,023, the highest ATP of 2023.”

“New electric vehicle sales were also strong in November, with initial estimates suggesting that November volume in the U.S. market was the second-best ever, behind only August 2024. And the story is likely similar to the broader market – higher incentives are helping.

In November, Kelley Blue Book estimates show that the average transaction price for a new EV was \$55,105, a decrease of 1.8% from the downwardly revised October price. EV prices last month were lower year over year by 3.8%. Incentive spending on EVs jumped, reaching 14.9% of ATP, the highest level since the pandemic and an increase from the upwardly revised 14.6% in October. At 14.9% of ATP, the typical incentive package last month for a new EV exceeded \$8,200, which includes, when applicable, point-of-sale government-backed incentives.”

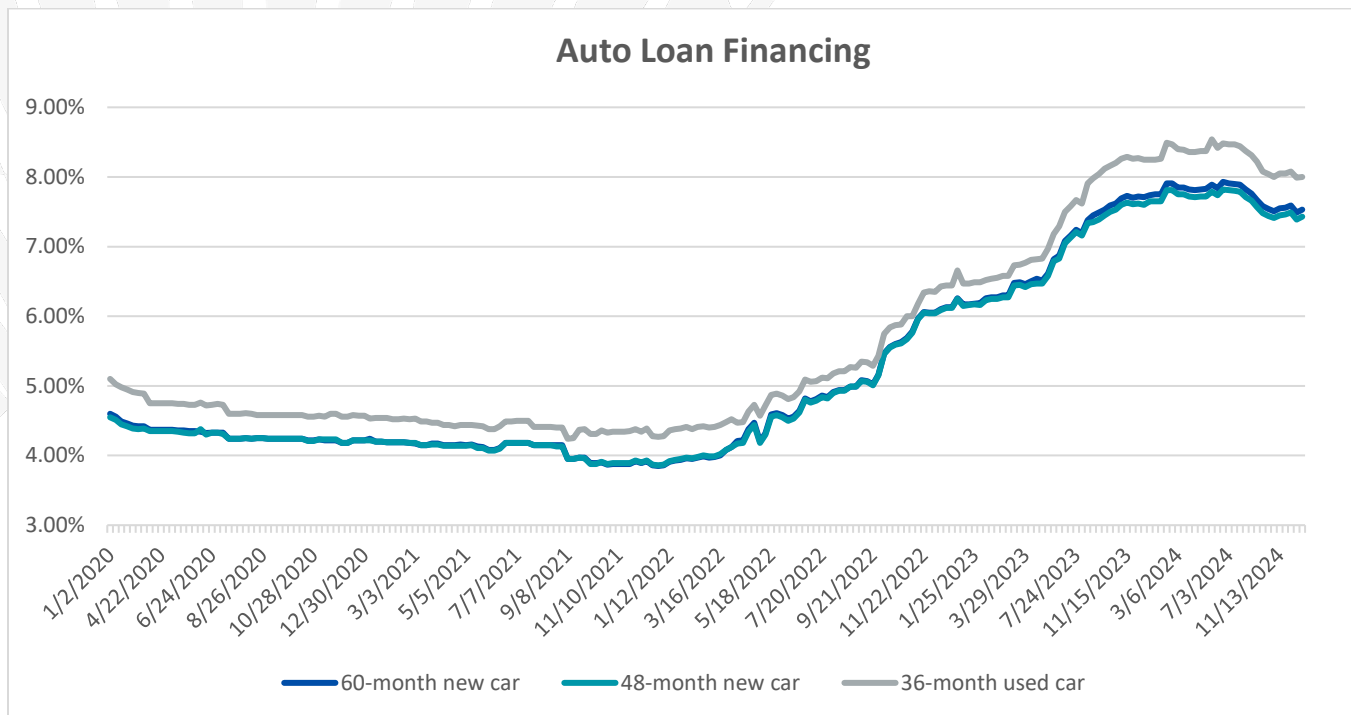


Auto Loan Financing (Updated 1/7)

Interest Rates (updated 12/5): Interest rates increased slightly on the 60-month, 48-month and the 36-month used car loans over the past two weeks. Rates now stand at 7.53%, 7.43%, and 8.0%, respectively. Since the beginning of 2020, 60-month rates are up 2.93 pp, and are down 0.21 pp since the same time a year ago.¹⁶

JD Power (1/7)¹⁷: “Average monthly finance payments this month are on pace to be \$753, up \$21 from December 2023. The average interest rate for new-vehicle loans is expected to be 6.09%, down 62 basis points from a year ago.

| Dates | 60-month new car | 48-month new car | 36-month used car |
|---------------------|------------------|------------------|-------------------|
| 1/2/2020 | 4.60% | 4.55% | 5.10% |
| 1/4/2024 | 7.74% | 7.65% | 8.25% |
| 12/18/2023 | 7.49% | 7.39% | 7.99% |
| 12/31/2023 | 7.53% | 7.43% | 8.00% |
| Two Week Change | 0.04% | 0.04% | 0.01% |
| Change since 1/3/20 | 2.93% | 2.88% | 2.90% |
| One Year Change | -0.21% | -0.22% | -0.25% |

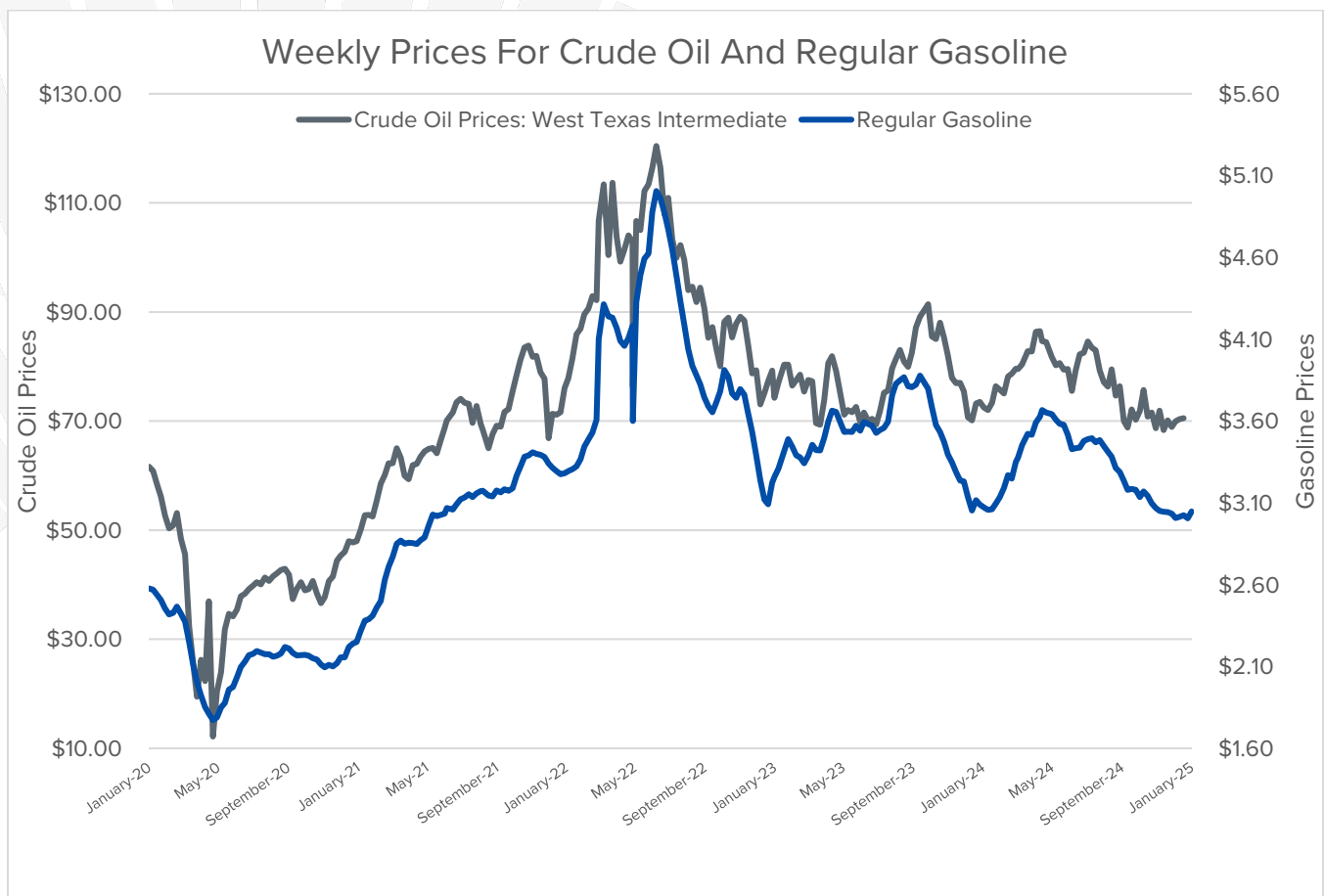


Crude Oil and Gas Prices (Updated 1/7)

Gas And Oil Remain Elevated, but Falling (1/7): Oil prices, as benchmarked at West Texas Intermediate were \$70.51 at the end of December, up \$0.17 from the prior week. Since election day 2020, oil prices are \$34 a barrel higher. Gas is up slightly from a week ago at \$3.05. Gas is 18% higher than the beginning of 2020 and has not been below \$3 a gallon since May 2021 (though it did hit \$3.01 at the end of December).¹⁸

EIA Outlook For Oil (1/7):¹⁹ “In our forecast, a combination of increasing domestic crude oil production and decreasing U.S. refinery runs means reduced net imports of crude oil next year. We forecast that net imports of crude oil into the United States will fall to 1.9 million barrels per day (b/d) in 2025, down from 2.5 million b/d this year, and the least crude oil net imports in a year since 1971. Total U.S. crude oil production in our forecast increases by 0.3 million b/d in 2025. At the same time, we expect U.S. refineries will process 0.2 million b/d less crude oil next year, down to 16.0 million b/d.”

EIA Outlook For Gasoline (11/6)²⁰: “We now expect the U.S. retail gasoline price to average \$3.20 per gallon (gal) in 2025, down 10 cents/gal from the September forecast. We also expect the \$3.20/gal average next year to be down 10 cents/gal from the 2024 average retail gasoline price.”



Production Meter

U.S. Light Vehicle Inventory and Days' Supply (Updated 1/7)

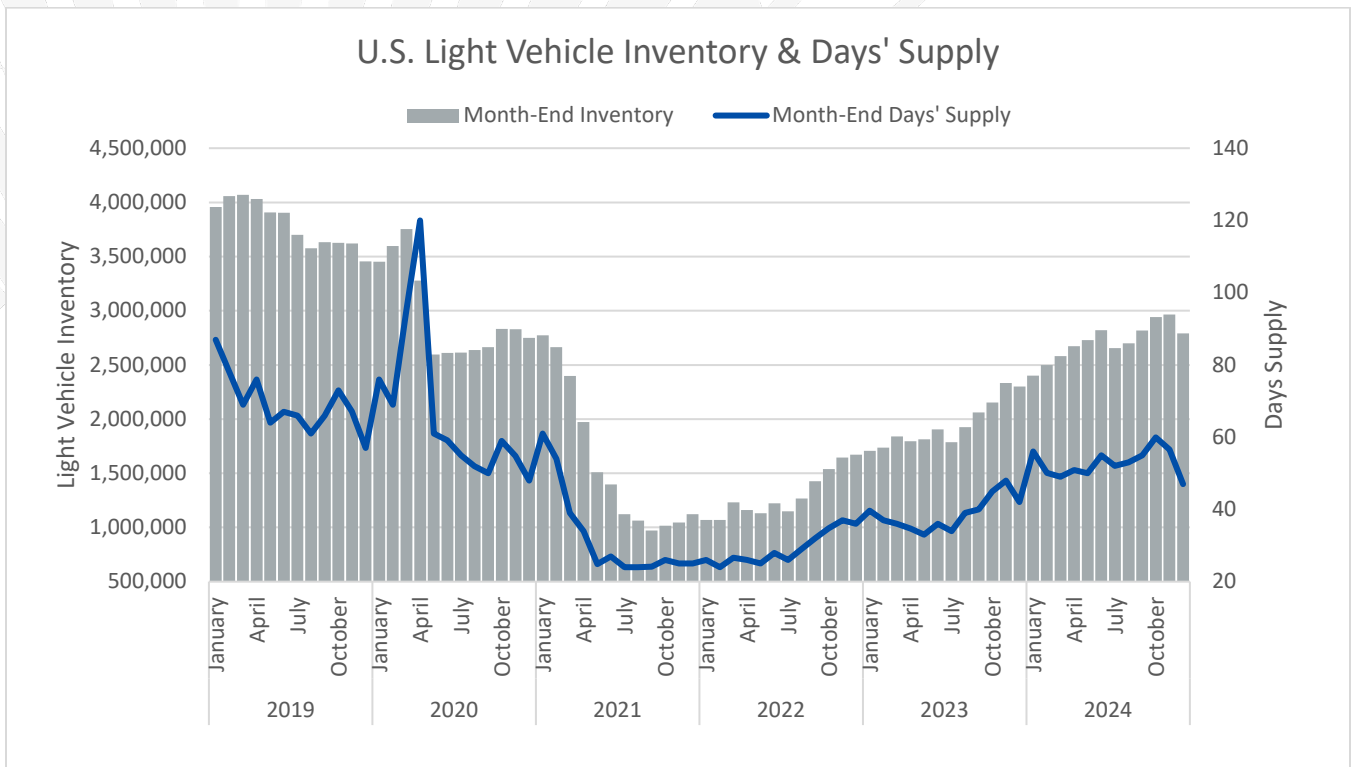
WardsIntelligence Inventory Update (1/7)²¹: “U.S. light-vehicle inventory fell 5.9% at the end of December from the prior month, totaling 2.79 million units, but was 21.0% above the same year-ago period.

“Inventory growth continues to slow, as the decline was more than the historically typical 4.0% November-to-December drop. Also, the year-over-year gap has fallen every month since 48.9% in July and is the smallest since August 2022, when inventory was 18.8% above the year-ago period.

“Dec. 31 days’ supply fell to 47 from the prior month’s 56 but was above like-2023’s 41 and highest for the period since 48 in 2020. Historically, a typical December days’ supply is 60.

“Inventory control management through production slowdowns mainly explains the above-average drop in inventory from the prior month. (December inventory always falls from November because of end-of-year holiday-related production shutdowns at most assembly plants, plus December tends to be a much stronger month for raw sales volume than November, pulling more stock off dealer lots.)

“Production slowdowns for the U.S. market are expected to continue in Q1-2025, further slowing inventory growth, which in turn could cap sales gains.”



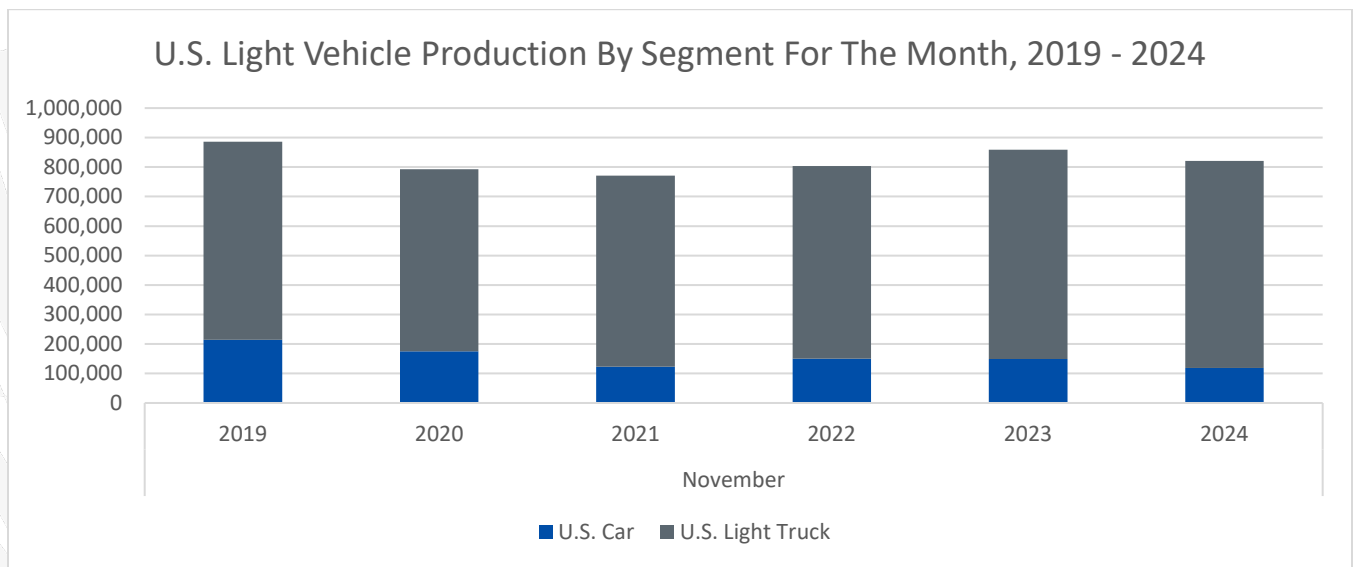
North American Production (Updated 1/7)

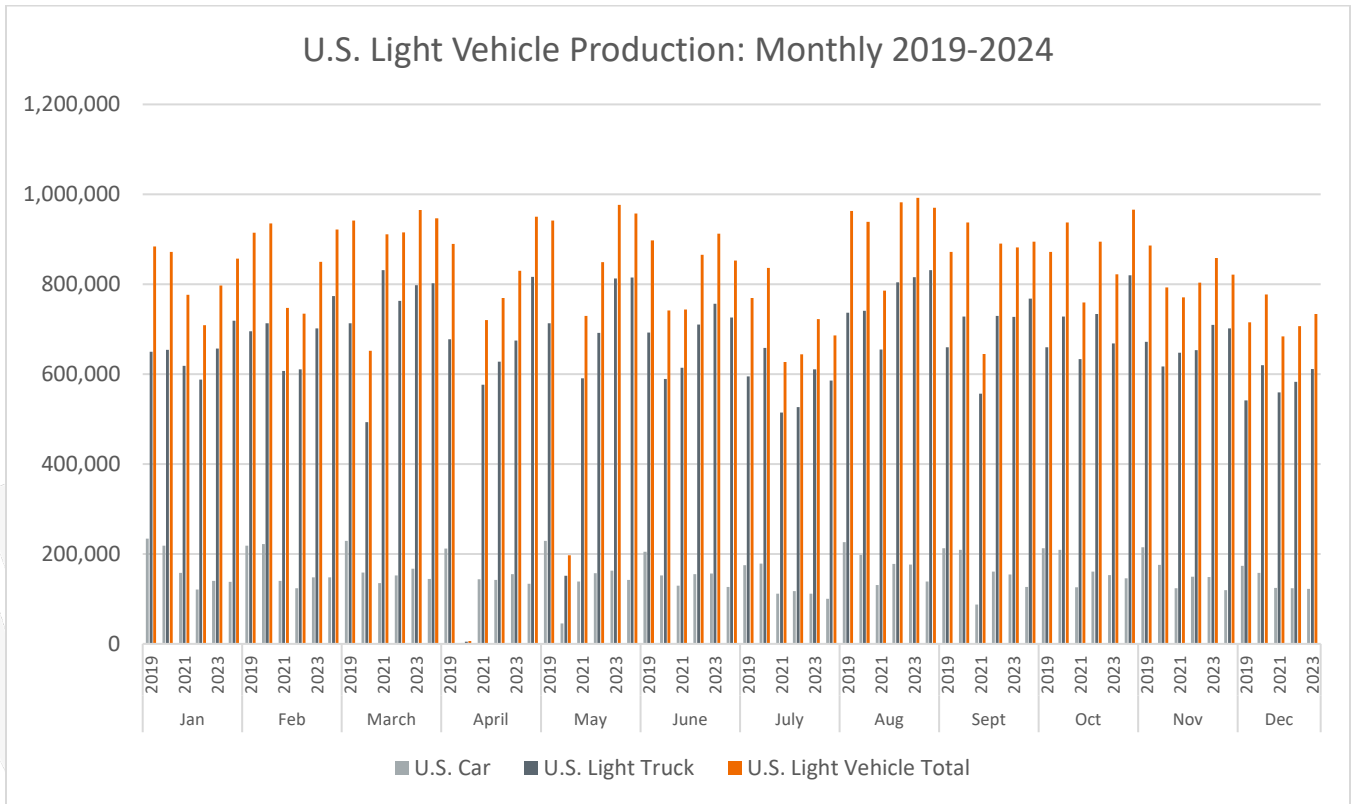
Wards Intelligence²²: “November’s results followed a downward revision to October equaling 4,600 units. North America output in October totaled 1.502 million, 6.7% above like-2023 – a solid gain but mostly because labor-related shutdowns muted output in the year-ago period.”

U.S. Light Vehicle Production (Updated 1/7)

U.S. Monthly Production (Updated 1/7)

U.S. Light vehicle production for November was down 14.6 percent month-over-month, totaling 821,333 vehicles (119,257 cars, 702,076 light trucks), year-over-year, production is down 4.8 percent from 2023.²³





Global Meter

Global Light Vehicle Sales (Updated 1/7)

Wards Intelligence²⁴: “Global vehicles sales in November continued the rebound started in October and expected for entire fourth-quarter 2024 when final results for the period are reported.

Including some estimates that will be revised later this year, November sales of light vehicles and medium-/heavy-duty trucks combined totaled 8.70 million units, 6.3% above like-2023. It was the second straight increase after volume slipped below year ago levels in Q3.

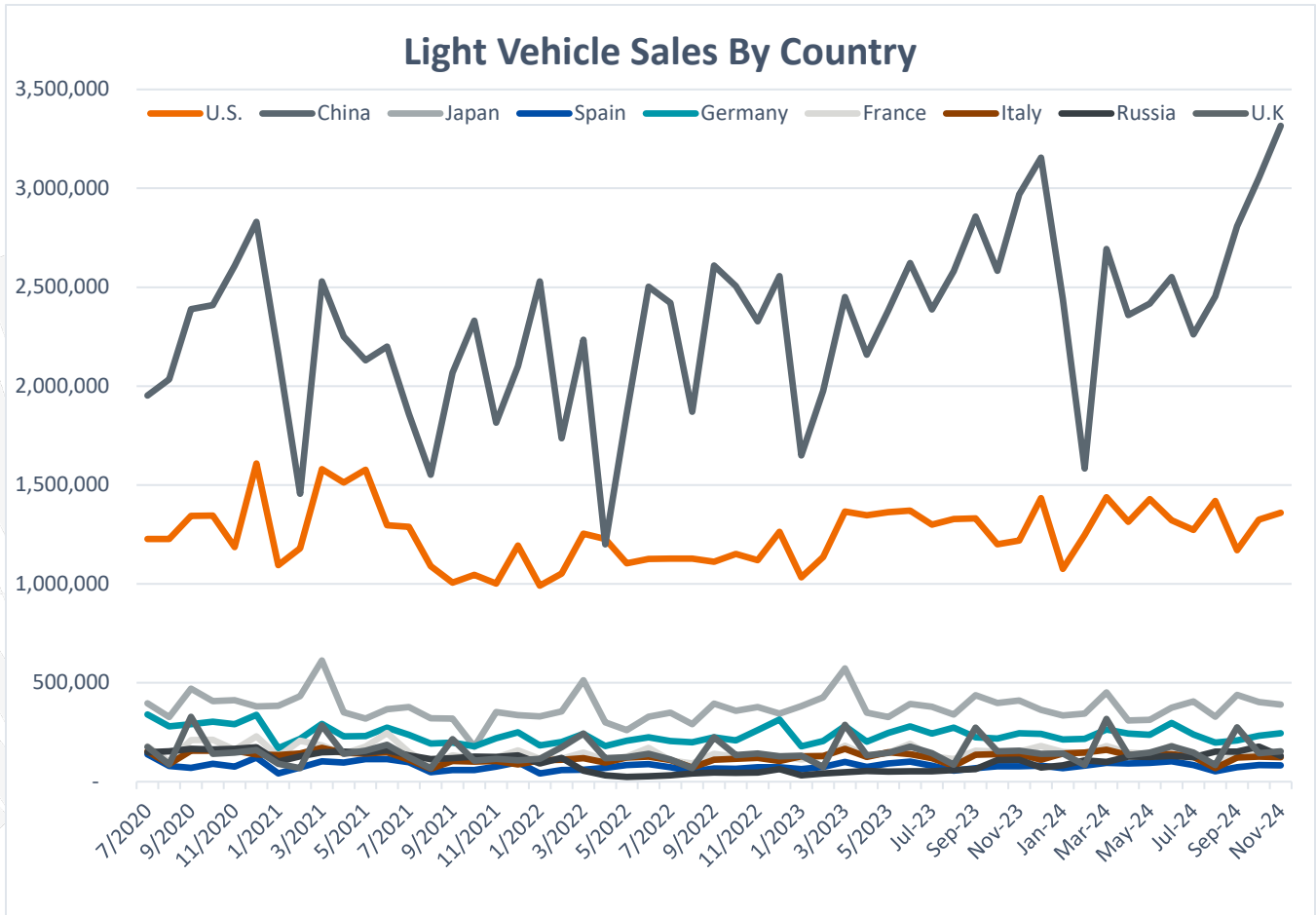
“Excluding medium- and heavy-duty trucks, light-vehicle deliveries totaled 8.42 million units, up 6.5% from November 2023.

“November’s results for total vehicle sales were up year-over-year in all major regions, except Europe where demand fell 1.4%.

“Calendar year-to-date global volume through November totaled 85.8 million units, up 2.4% from like-2023. Excluding big trucks, light-vehicle volume year-to-date totaled 82.6 million, also 2.4% above the year-ago period.

“Wards Intelligence partner GlobalData pegged November’s annualized rate for light vehicles at 95.0 million units, well above October’s 93.0 million.

“GlobalData expects global light-vehicle sales for entire-2024 to total 88.7 million units, up 2% from 2023. Although there is a lot of uncertainty heading into this year, sales in 2025 also are forecast to rise 2% year-over-year, totaling 90.8 million.”



Global Light Vehicle Production (Updated 1/7)

S&P Global Mobility Forecast (1/7)²⁵: “As 2024 draws to a close, the auto industry continues to navigate uncertain terrain. Light vehicle production across a number of regions continues to be influenced by ongoing inventory management efforts and mixed demand dynamics in the near-term. The production outlook reflects these ongoing challenges. However, one of the more significant impacts to the forecast from a macro perspective this month is the inclusion of the assumption that the incoming Trump administration will proceed with a tariff increase to a universal standard rate of 10% (up from the typical 2.5%) and a China-specific tariff of 30% (compared to a current average of around 21% depending on the product). Note, we currently assume Canada and Mexico will be exempt from these tariffs as part of the governing USMCA trade agreement. Given likely revisions to US emissions requirements by the incoming administration, we expect material reductions

in BEV volumes/market share and adjustments in electrification mix. The December forecast update reflects a mix of upgrades in the extreme near-term and rather material downgrades for various regions in the intermediate term. Downward revisions for 2025 and 2026 reflect some of the negative impacts of broader tariff actions from the incoming Trump administration as well as market-specific influences of dynamic demand fundamentals and inventory management, among other factors. The more noteworthy regional adjustments with the latest forecast update are detailed below:

“Europe: The outlook for Europe light vehicle production was increased by 41,000 units and reduced by 261,000 units for 2024 and 2025, respectively (and reduced by 261,000 units for 2026). In the extreme near-term, Q4-2024 production numbers are proving a bit stronger than expected, resulting in a modest increase in the outlook for full-year 2024. Looking ahead to 2025 and 2026, the outlook for broader European light vehicle production was reduced rather notably. Volumes were reduced mainly from Q2-2025 onwards. The primary driver for the forecast revision is related to the incorporation of new tariff/trade assumptions associated with the incoming Trump administration. Premium vehicles are particularly vulnerable to a new universal standard tariff of 10% although new macroeconomic assumptions also weigh on domestic demand and impact mainstream automakers.

“Greater China: The outlook for Greater China light vehicle production was increased by 150,000 units and reduced by 162,000 for 2024 and 2025, respectively (and reduced by 340,000 units for 2026). Output in China in November maintained momentum supported by scrapping incentives with production posting 7% growth year-over-year. According to media reports, over four million applications have been registered on the national vehicle replacement platform through the end of November, leading to a high degree of potential new vehicles sales, particularly for the NEV market. Further, driven by strong price promotion, vehicle retail sales expanded to double-digit gains in November according to CPCA estimates. Regarding the NEV market, electrified passenger vehicles including PHEV and REX achieved over 50% growth year-over-year and posted a 53% market share in November. In the quest to achieve annual targets and support GDP growth, strong price promotion and production expansion by most OEMs is expected to result in a solid year-end close. Given recent sales and production strength and an improved near-term outlook, the forecast for 2024 was revised upward to 29.9 million units, representing 2.9% growth y-o-y. However, with ongoing economic uncertainties, a likely pay-back effect related to the scrapping policy and expected trade tensions with the incoming Trump administration, the outlook for 2025 and 2026 was revised downward and now reflects growth of 0.1% and 3.5%, respectively.

“Japan/Korea: Full-year 2025 and 2026 Japan production was downgraded by 109,000 units and 30,000 units, respectively, relative to last month’s forecast. The risk of stagnant exports due to tariff hikes and anemic domestic demand due to weaker global economic fundamentals are the primary drivers for this month’s forecast revisions. The long-term outlook for Japan production beyond 2027 was upgraded as increased ICE export opportunities resulting from slower BEV growth in the US is expected to outweigh the negative impact from US tariff hikes. With both domestic sales and exports showing a downward trend, the South Korea production forecast for 2024 has been reduced by about 18,000 to 4.07 million units. The Trump administration’s 10% universal tariff is expected next year. Although Korea has signed an FTA with the United States, it seems difficult to escape this policy, and it will put pressure on South Korea’s exports to the US. Accordingly, the production forecasts for 2025 and 2026 have been reduced by 36,000 units and 11,000 units, respectively. In the longer term, South Korea production volumes from 2028 onwards were upgraded by around 60,000 units per year as a positive effect of demand dynamics more biased toward ICE (relative to BEV), especially in the US, is expected.

“North America: The outlook for North America light vehicle production was increased by 23,000 units and reduced by 173,000 units for 2024 and 2025, respectively (and reduced by 238,000 units for 2026). The short-term outlook for light vehicle production in North American 2024 was revised higher by 0.1% with the

year expected to total 15.5 million units. Stronger than expected production results were fueled by increases that happen to center on vehicles with currently excessive inventory levels. The incoming Trump administration will mark a return to the predictably unpredictable with policies that are expected to influence overall demand and challenge vehicle mix assumptions. The impact is expected to be less intrusive in the short term with greater risks to the mid- and long-term forecasts with higher inflation resulting in interest rates remaining elevated for a longer period. The outlook for regional production in 2025 was revised down 1.1% totaling 15.1 million units. Reductions are broad-based with cuts at the Detroit 3 most prominent given the need to adjust production to align to demand and reduce their continued excessive inventory levels. Continuing the downward revisions, production in North America for 2026 was revised down 1.5% totaling 15.34 million units. This latest outlook would have both 2025 and 2026 production levels below 2024 amid the challenges within the industry.

“South America: The outlook for South America light vehicle production was increased by 43,000 units and by 12,000 units for 2024 and 2025, respectively (and reduced by 23,000 units for 2026). In the extreme near-term, the outlook has been upgraded due to continued stronger demand momentum in Brazil. This relative strength has been more favorable to local production (versus imports). For 2025 and 2026, production volumes remained rather stable with a slight increase in 2025 that is then offset by a reduction for 2026. This largely mirrors revisions to Brazilian demand with momentum extending into 2025. However, beyond 2025, new and more cautious macro considerations start to negatively impact the outlook, mostly in the wake of expected Trump administration tariffs that are expected to contribute to lower overall economic growth. Even so, the revisions remain rather modest as the region is somewhat more isolated than other regions. Further, there are potential positive collateral effects to anticipated US tariff/trade changes given the possibility that Chinese investment might increase in the region to compensate for reduced activity in North America (specifically Mexico).

“South Asia: The outlook for South Asia light vehicle production was increased by 50,000 units and by 1,000 units for 2024 and 2025, respectively (and reduced by 115,000 units for 2026). South Asia's light vehicle production forecast update for 2024 was particularly impacted by stronger actualized production for both Vietnam and Malaysia. Looking to 2025 for the ASEAN market, the production outlook for Thailand and Indonesia have been revised down on concerns over slower economic growth and global trade tensions driven by expected universal tariffs by the incoming Trump administration. Regarding the India market, production was increased modestly for 2024 while output for 2025 was increased by 48,000 units. In the near-term, production support follows upward revisions for the demand outlook. A production downgrade for India in 2026 includes a fairly material reduction for the Maruti Suzuki e-Vitara on reported lower production plans for the automaker.

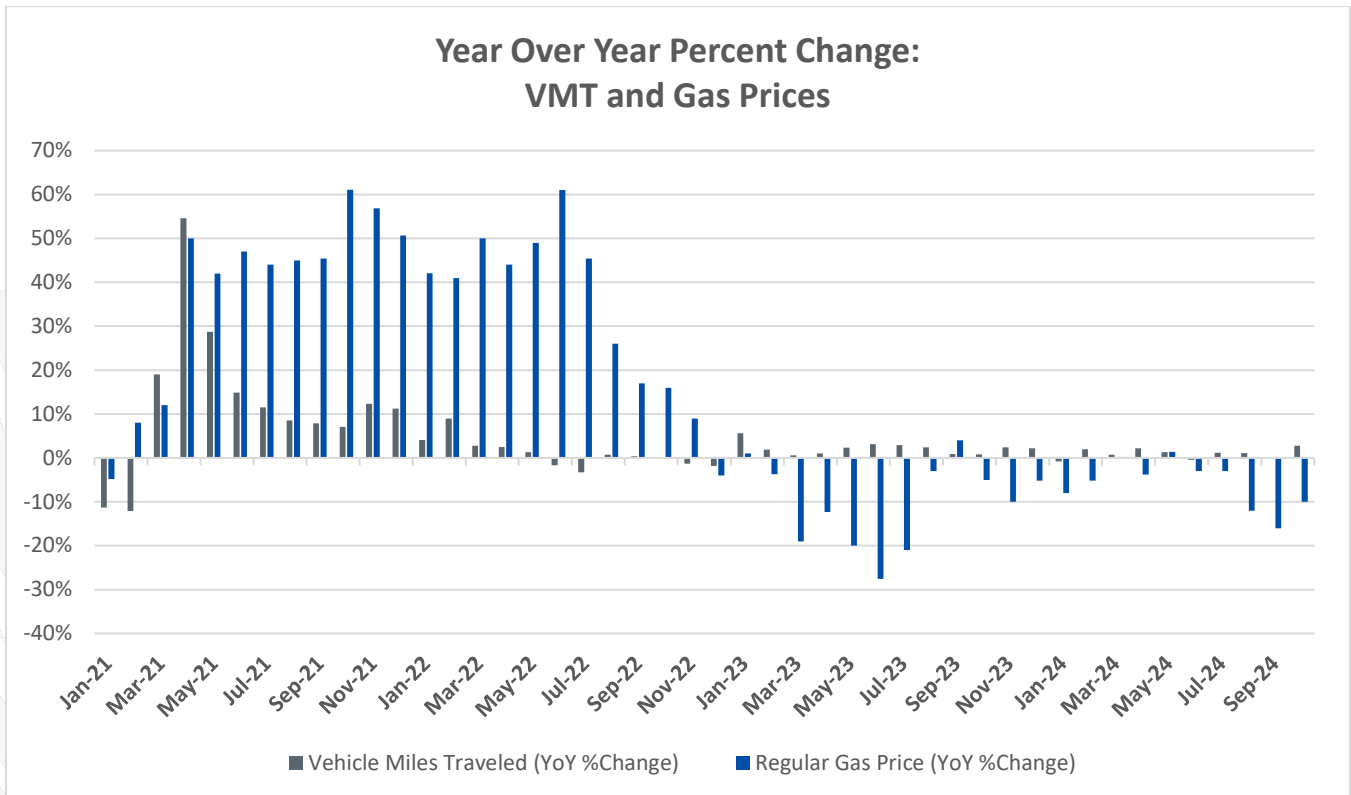
Recovery Meter

Roadway Travel (Updated 1/7)

According to the U.S. Department of Transportation, seasonally-adjusted vehicle miles traveled in October increased by 2.3 percent from the same time a year ago. The cumulative travel estimate for 2024 is 2,762 billion vehicle miles.²⁶

- Travel on all roads and streets changed by +2.8% (+7.9 billion vehicle miles) for October 2024 as compared with October 2023. Travel for the month is estimated to be 291.9 billion vehicle miles.

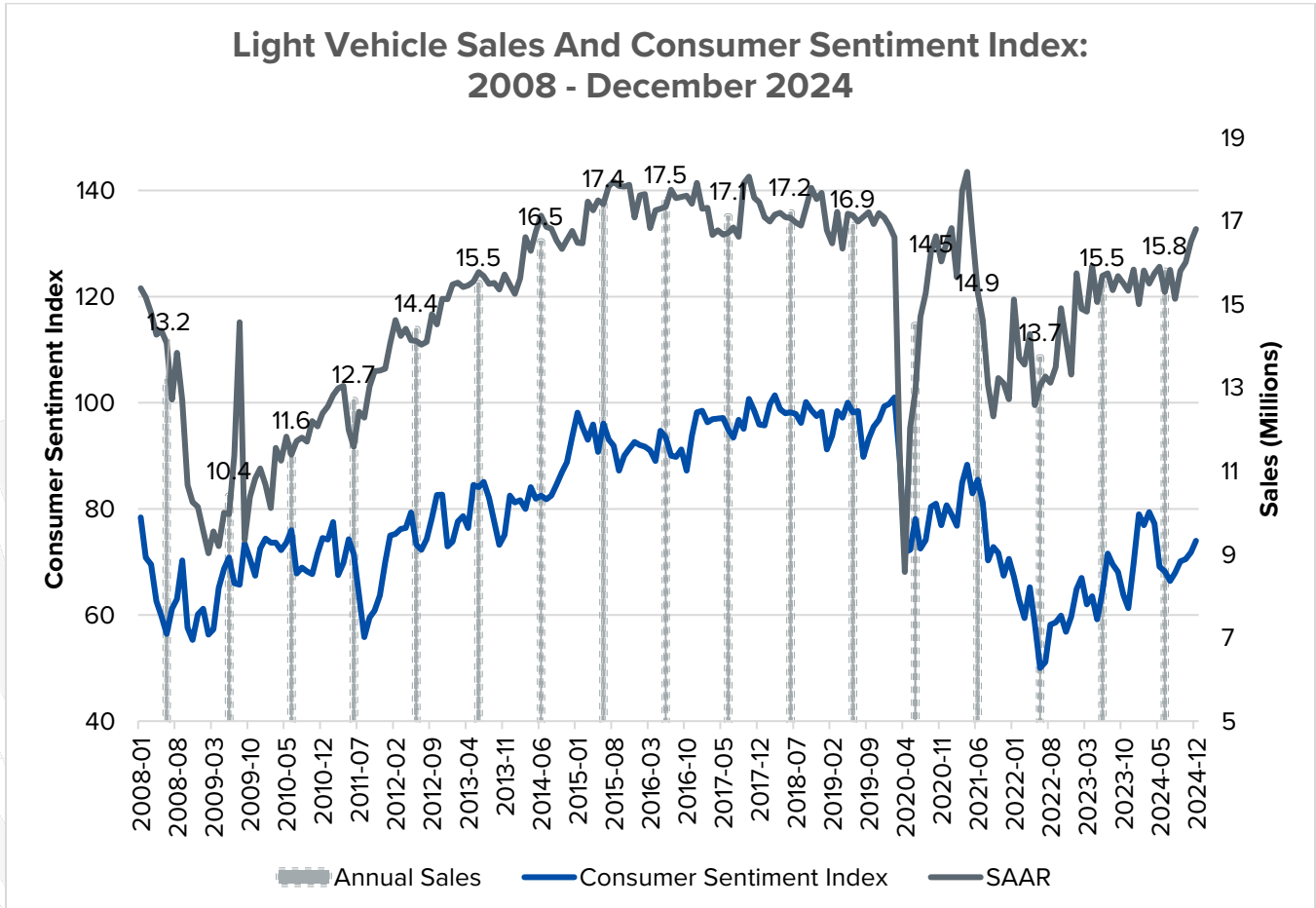
- The seasonally adjusted vehicle miles traveled for October 2024 is 277.4 billion miles, a +2.3% (6.2 billion vehicle miles) change over October 2023. It also represents a 0.9% change (2.4 billion vehicle miles) compared with September 2024.
- Cumulative Travel for 2024 changed by +1.0% (+27.7 billion vehicle miles). The cumulative estimate for the year is 2,762.0 billion vehicle miles of travel.



Consumer Confidence and Sales (Updated 1/7)

Surveys of Consumers Director Joanne Hsu²⁷: “Consumer sentiment confirmed its early-month reading, rising for the fifth consecutive month and reaching its highest value since April 2024. Buying conditions exhibited a particularly strong 32% improvement, primarily due to a surge in consumers expecting future price increases for large purchases. The expectations index continued the post-election re-calibration that began last month, climbing for Republicans and declining for Democrats in December. Importantly, for Independents, expectations were essentially unchanged from the past month or so for personal finances, short-run business conditions, and long-run business conditions. Broadly speaking, consumers believe that the economy has improved considerably as inflation has slowed, but they do not feel that they are thriving; sentiment is currently about midway between the all-time low reached in June 2022 and pre-pandemic readings.

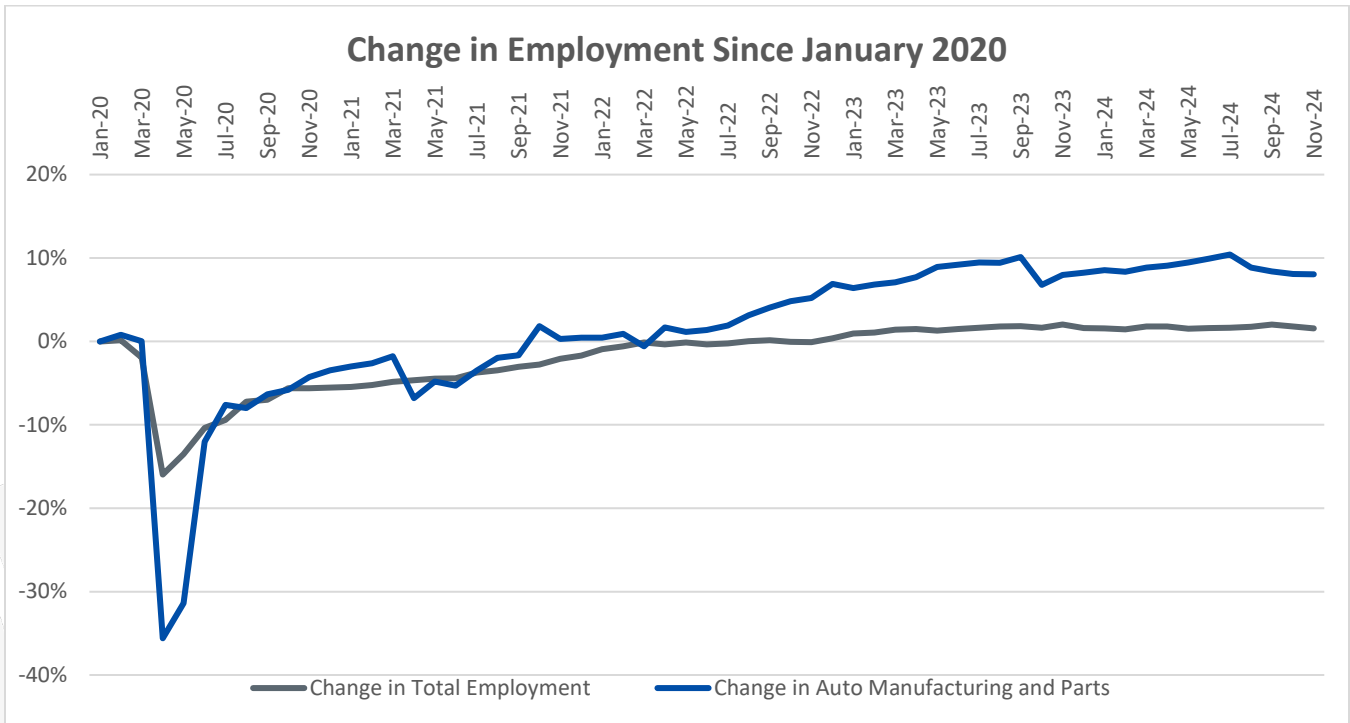
Year-ahead inflation expectations rose from 2.6% last month to 2.8% this month, the first month-over-month increase since May, but within the 2.3-3.0% range seen in the two years pre-pandemic. Long-run inflation expectations edged down from 3.2% last month to 3.0% this month, modestly elevated relative to the range of readings seen in the two years pre-pandemic.”



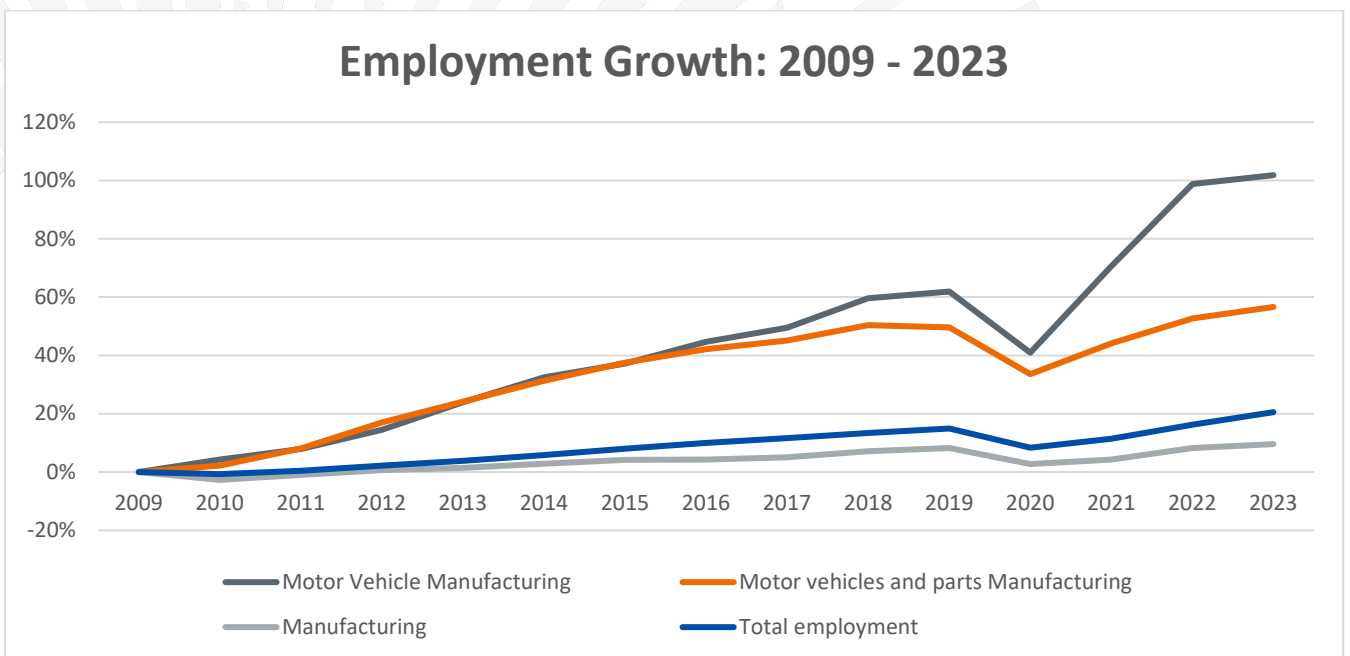
Employment (Updated 1/7)

Motor Vehicle And Parts Manufacturing Gained 1,600 Jobs in November.

After a loss of nearly 350,000 employees (about 35% of the workforce) in the height of the pandemic, employment in the Automobile Manufacturing and Parts sectors raced back but is now fighting losses due to supply chain disruptions with semiconductors.²⁸



After the recession in 2009, the auto industry was credited with being on the leading edge of the recovery, which began a ripple effect through other parts of the country.²⁹ Additionally, the chart below shows how the recovery of jobs in motor vehicle manufacturing alone and motor vehicle and parts manufacturing far outpaced the recovery of manufacturing and total jobs.



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