

# Chicago Fed Letter

## Economy on cruise control through 2007

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According to participants in the Chicago Fed's annual Automotive Outlook Symposium, the outlook for 2006 is for the U.S. economy to expand at a rate slightly above its trend, with unemployment edging lower. Since energy prices are expected to moderate, inflation is forecasted to fall this year. Light vehicle sales are predicted to remain steady.

In 2005, the economy expanded by 3.5%, a rate slightly above potential growth for the U.S. economy, leading to a decline in the unemployment rate from 5.4% in the fourth quarter of 2004 to 4.9%

in the final quarter of 2005. The economy added nearly two million jobs in 2005, averaging 165,000 jobs per month.

Yet the economy experienced a substantial swing in economic activity beginning in the third quarter of last year. Real gross domestic product (GDP) expanded by 4.1% in the third quarter, slowed to 1.7% in the fourth quarter, and then bounced back up to 5.6% in the first quarter of 2006. There were a number of factors that contributed to this pattern.

Faced with mounting inventories of light trucks in the early part of 2005, domestic nameplate manufacturers began to offer "employee pricing" to their customers. This pulled sales up substantially in the middle of last year. While light vehicle sales totaled 16.9 million units

in 2005, the third quarter selling rate soared to 17.9 million units at a seasonally adjusted annual rate (SAAR), with July recording the second strongest selling month in history at 20.7 million units (SAAR). These attractive discount programs pulled forward purchases into the third quarter, and light vehicle sales in the fourth quarter slipped to 15.9 million units (SAAR). October sales declined to 14.7 million units (SAAR), the first monthly reading below 15 million in over seven years.

This pattern in vehicle sales contributed to personal consumption expenditures growth rising to 4.1% in the third quarter and then falling to 0.9% in the fourth quarter. However, if we remove motor vehicles from personal consumption expenditures, spending in the fourth quarter actually increased 4.3%, faster than the 3.5% recorded in the third quarter.

Accentuating this pattern were Hurricanes Katrina and Rita, which hit Gulf Coast states in August and September. The disruption to oil and gas extraction, as well as oil refining, was quite severe, with nearly a third of refining capacity closed at one point. Energy materials production fell 14.3% in the fourth quarter.

As we entered 2006, vehicle sales returned to more stable selling rates, with sales averaging 16.9 million units (SAAR)

### 1. Median forecast of GDP and related items

	2005 (Actual)	2006 (Forecast)	2007 (Forecast)
Real gross domestic product <sup>a</sup>	3.5	3.5	3.0
Real personal consumption expenditures <sup>a</sup>	3.5	3.5	2.9
Real business fixed investment <sup>a</sup>	8.6	8.9	5.9
Real residential investment <sup>a</sup>	7.1	-1.7	-0.9
Change in private inventories <sup>b</sup>	20.3	31.0	31.2
Net exports of goods and services <sup>b</sup>	-633.1	-682.3	-681.7
Real government consumption expenditures and gross investment <sup>a</sup>	1.8	2.4	1.7
Industrial production <sup>a</sup>	3.2	3.6	3.3
Car & light truck sales (millions of units) <sup>c</sup>	16.9	16.7	16.8
Housing starts (millions of units) <sup>c</sup>	2.07	1.97	1.83
Unemployment rate <sup>d</sup>	5.1	4.8	4.9
Consumer Price Index <sup>a</sup>	3.4	2.6	2.4
1-year Treasury rate (constant maturity) <sup>d</sup>	3.62	5.14	5.05
10-year Treasury rate (constant maturity) <sup>d</sup>	4.29	5.29	5.44
JPMorgan trade weighted dollar index <sup>a</sup>	-2.4	-1.2	-0.5
Oil price (dollars per barrel of West Texas Intermediate)	56.47	65.51	66.00

<sup>a</sup>Fourth quarter over fourth quarter percent change.

<sup>b</sup>Billions of chained (2000) dollars.

<sup>c</sup>Fourth quarter average.

<sup>d</sup>Percent.

SOURCES: Actual data from Haver Analytics; median forecast from Automotive Outlook Symposium participants.

in the first quarter, in line with last year's sales. Energy materials output rose 11.9% in the opening quarter as a good part of the disrupted Gulf production came back on line. Because the severe shocks were not repeated in the first quarter, real GDP growth rebounded to 5.6%. Also, the unemployment rate fell to 4.7% in the opening quarter of 2006.

One challenge the economy continues to face is the effect of rising energy prices. Oil prices rose from around \$47 per barrel at the beginning of 2005 to slightly above \$60 by the end of the year. It has continued to move higher in the early part of 2006, rising to over \$70 per barrel in May.

Higher energy prices have contributed to the rising inflation rate. Running around 3.0% in early 2005, inflation rose to average 3.7% in the first quarter of 2006.

The Federal Reserve continued raising short-term interest rates throughout

While light vehicle sales remained relatively stable, the Big Three's market share continued to deteriorate. Compared with last year's market share through May, the Big Three's year-to-date market share fell an additional 2.6 percentage points, averaging 54.9% in the first five months of 2006. This translates into a sales loss of over 400,000 units over this period. This amount represents a loss that is equivalent to the annual output of roughly two assembly plants.

Against this backdrop, the Federal Reserve Bank of Chicago held its thirteenth annual Automotive Outlook Symposium on June 1 and 2, 2006, at its Detroit Branch. More than 80 economists and analysts from business, academia, and government attended the conference. This *Chicago Fed Letter* reviews last year's forecasts for 2005; analyzes the forecasts for 2006 and 2007 (see figure 1); and summarizes the presentations at this year's conference.

While housing starts were expected to rise to 2.00 million units in 2005, they actually increased to 2.07 million units.

The forecasts for 2006 and 2007 are for economic growth, outside of the housing sector, to remain solid this year and then to moderate in the following year but still expand at a rate that would be regarded as close to trend. The housing sector is forecasted to fall at a controlled pace both this year and next. Real GDP is anticipated to rise by 3.5% this year and by 3.0% in 2007. With economic growth being slightly above trend this year, the unemployment rate is expected to fall to average 4.8% in the fourth quarter of this year and then edge higher to average 4.9% in the final quarter of 2007. Inflation in 2006 is expected to decline to 2.6% and then ease a bit more next year to 2.4%. Oil prices are predicted to fall to average \$65.51 per barrel in the final quarter of this year and then remain at that level, averaging \$66.00 at the end of 2007. Personal consumption expenditures are forecasted to expand by a solid 3.5% rate in 2006 and then rise by 2.9% in 2007. Light vehicle sales are expected to remain steady, with sales edging down to 16.7 million units this year and then edging back up to 16.8 million units next year. Business fixed investment is expected to increase a strong 8.9% in 2006 and 5.9% in 2007. Industrial production is forecasted to increase at a slightly faster rate than GDP growth, rising 3.6% this year and 3.3% next year. With this increased pace, business inventory increases are expected to rise to a level that is slightly higher than in the past several years.

One sector that takes a step back over the next year and a half is housing. With long-term interest rates forecasted to increase by 100 basis points in 2006 and by an additional 15 basis point in 2007, housing starts are predicted to fall in 2006 to a level of 1.97 million units and then to 1.83 million units in 2007. After rising by 7.1% in 2005, residential investment is expected fall 1.7% this year and then decline 0.9% in 2007.

The dollar's value has been declining over the past four years. The dollar is predicted to decline in 2006 and 2007 by

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2005 and early 2006, with the federal funds rate rising from 2.25% at the beginning of last year to 5.00% by May of this year. Yet mortgage interest rates stayed low through most of 2005, averaging around 5.75% for the first three quarters of 2005; they began to rise, averaging 6.22% in the fourth quarter of 2005, and eventually reached 6.60% in May 2006.

This increase in mortgage rates appears to be gradually slowing the housing market. Year-to-date housing starts through May of this year were 2.04 million units, down 1.3% from a comparable period a year earlier.

Manufacturing output expanded at a solid pace in 2005, increasing 4.3%. Manufacturing output growth expanded at a faster pace in the first quarter of 2006, rising by 5.9% compared with the previous quarter.

At the 2005 Automotive Outlook Symposium, participants were anticipating that the economy in 2005 would expand at a 3.2% rate, just a bit below the 3.5% growth that did occur. With an accurate economic growth forecast, they also were quite close in their forecast for the unemployment rate. They expected that the unemployment rate would fall to average 5.2% in the fourth quarter of 2005, virtually in line with the actual 5.1% rate that unemployment averaged. Inflation was predicted to average 2.7%, lower than the 3.4% actual rise in inflation. This higher actual result was in part due to a tamer outlook for oil prices in 2005. Last year, forecasters expected oil prices to average \$49 per barrel in the fourth quarter of 2005, but oil prices wound up averaging over \$56. Light vehicle sales were predicted to come in at 16.7 million units, slightly below the 16.9 million units sold during 2005.

1.2% and 0.5%, respectively. The trade deficit is predicted to worsen in 2006 and then remain unchanged next year.

#### Auto sector outlook

Paul Ballew, the executive director of global market and industry analysis for General Motors Corporation (GM), delivered the 2006–07 vehicle sales outlook for the Big Three automakers. In his presentation, Ballew discussed markets that underperform due to various pressures, including the dual problem of rising oil costs and interest rates. Global economic expansion is expected to continue in the near future, leading to higher oil prices and interest rates. Due to these factors and an expected softening in the housing market, automotive sales are only expected to increase approximately 1.5 million units in 2006.

According to Ballew, the automotive industry is increasingly facing more challenges. Currently, the industry must restructure itself by creating a new and improved business model that accommodates price pressures. Unfortunately, outside factors, such as higher oil prices and interest rates, are hindering the auto companies' plans to launch a new business model. In addition, legacy costs (e.g., health care costs for retired workers) provide another obstacle to industry restructuring. On a positive note, however, product costs, marketing costs, and operational costs are competitively priced for this industry. Even though 2006 is forecasted to be a stronger year than 2005 for the automotive industry, Ballew noted that the Big Three's market share has been steadily decreasing since 1965. Still, a positive note for GM in particular is the fact that its attrition program is much stronger than expected.

The next speaker, Ken Vieth, the co-principal for Americas Commercial Transportation Research Company, presented the heavy equipment outlook. He stated that with the Environmental Protection Agency's new mandates to reduce emissions in 2007, Class 8 trucks (trucks that haul everyday products) are predicted to continue to have strong sales through the end of 2006. Retail sales of Class 8 trucks reached record levels in April 2006, Vieth noted, and

build rates for these trucks continue to stay at high levels. Even though truck sales remain strong, the major problem with trucking seems to be the lack of available drivers. This truck driver shortage is a global problem and allows truckers to retain their pricing power and to pass along their increased costs, such as higher fuel prices, to their suppliers. There is a great demand for hauling freight, but the lack of truck drivers requires the trucking industry to look at other means of transporting goods. Transporting goods by rail has the potential to help (trucking companies have been known to place trailers onto rail cars due to lack of drivers). Still, railroad transport cannot reduce all the backlogs in trucking transport because there simply aren't enough rail cars, nor is there enough storage capacity on trains. Should the demand for trucking/railroad shipments follow the current expansive trend, some relief may come with a new 2009 highway bill that contains a provision allowing trucks to carry more freight. If that bill passes, the new longer and heavier trucks that would follow might form part of the solution to the lack of drivers.

David Andrea, vice president of the Original Equipment Suppliers Association, presented the auto suppliers' perspective on the auto industry outlook. Andrea pointed out that U.S. domestic motor vehicle sales are strong, but flat. The Big Three's sales have been rapidly declining for years, while international automakers have increased their sales over the same time period. This is causing manufacturing, especially in the Midwest, to reduce a significant number of jobs. Thus, direct supplier jobs were down 20% from 1990 to 2005. Over that same period, Michigan, Ohio, and Indiana lost 28%, 17%, and 21% of their direct supplier jobs, respectively. Because there must be a restructuring of operations and strategies for this very competitive industry, both the auto manufacturers and their suppliers have much work to do.

David Cole, the chairman for the Center for Automotive Research, talked about the future for the U.S. automotive industry. "The automotive industry has a problem," Cole explained. But this is

both good and bad news for the industry. Since there is a crisis, it is uncomfortable for the auto companies and their workers; however, this crisis creates an urgency among domestic producers to change. Doing nothing is no longer an option: Change is mandatory in order to survive. Increased sales volume will not heal the industry anymore. Domestic auto companies must shrink in size in order to obtain a profitable base. According to Cole, to complete this reduction, the Big Three must follow one of the foundations for business excellence: discipline. Starting with the most efficient process and then adding in creativity and innovation, the domestic auto manufacturers should become leaner and more agile. With plants being able to integrate new products quickly through flexible, lean manufacturing, more profit is the predicted outcome. This new business model requires a 60%–80% reduction in the number of physical prototypes previously required by manufacturers. If this target is met, stated Cole, the next wave of manufacturing should be dramatically improved.

Paul Taylor, the chief economist at the National Automobile Dealers Association, talked about the sales outlook

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from the dealers' perspective. Even with gas prices being quite high, large cars and crossover utility vehicles (CUVs)—utility vehicles built on passenger car platforms—are doing well. However, sales of truck-based sports utility vehicles (SUVs) have decreased over the past two years, and those sales are projected to fall further in the future. With that being said, Taylor noted that hybrid vehicle sales could be the wave of the future. Ford, Honda, and Toyota have been selling more and more hybrid units over the past two years. While hybrids are useful to consumers in that they require less fuel and are environmentally

friendly, they are only a short-term solution. The problem for hybrid cars arises with their resale value: Hybrids' battery packs are anticipated to need replacement every eight to 11 years, and their costs should run between \$8,000 and \$10,000 per vehicle. Thus, the owner of a used hybrid car has to spend close to a new car's price just to replace its battery pack. This costly feature is an obvious deterrent for some consumers to buy used hybrids. Last year, Taylor said that dealers seemed to be optimistic about the future, especially for their precertified used cars. This statement has held true, since used

cars have been shown to be the most profitable market for dealers.

### **Conclusion**

The outlook for 2006 is for the economy to expand at a rate slightly above trend for the economy, leading to a slight fall in the unemployment rate. With an anticipated moderation in energy prices, inflation is expected to fall this year. Growth in 2007 is predicted to slow, with GDP growth a bit below trend, the unemployment rate edging higher, and inflation easing further. Light vehicle sales are forecasted to remain relatively flat in 2006 and 2007.