

# Business/Customer Forecast Report



NATIONAL TOOLING AND MACHINING ASSOCIATION SPRING 2006

## Business Forecast Summary

Evidence continues to build confirming the budding strength of the U.S. economy. Clearly, a major factor in the first quarter was the exceptionally strong GDP numbers.

The U.S. Commerce Department reported that the gross domestic product, which is a measure of the nation's output of goods and services, rose at a 4.8 percent annual rate. Then in April, more positive developments were found in the monthly survey conducted by the highly respected Institute of Supply Management—see below.

After nine consecutive quarters of declining business investment, there now have been 11 straight quarters of growth—which among other impacts has led to a substantial increase in employment. In fact isolated pockets of skills-shortages are showing up.

Overall, some 4.9 million new jobs have been created through March. In that month alone, the manufacturing sector added 19,000 workers. That is the largest number of production workers added over the past three years.

### Consumer Confidence Spurs Spending

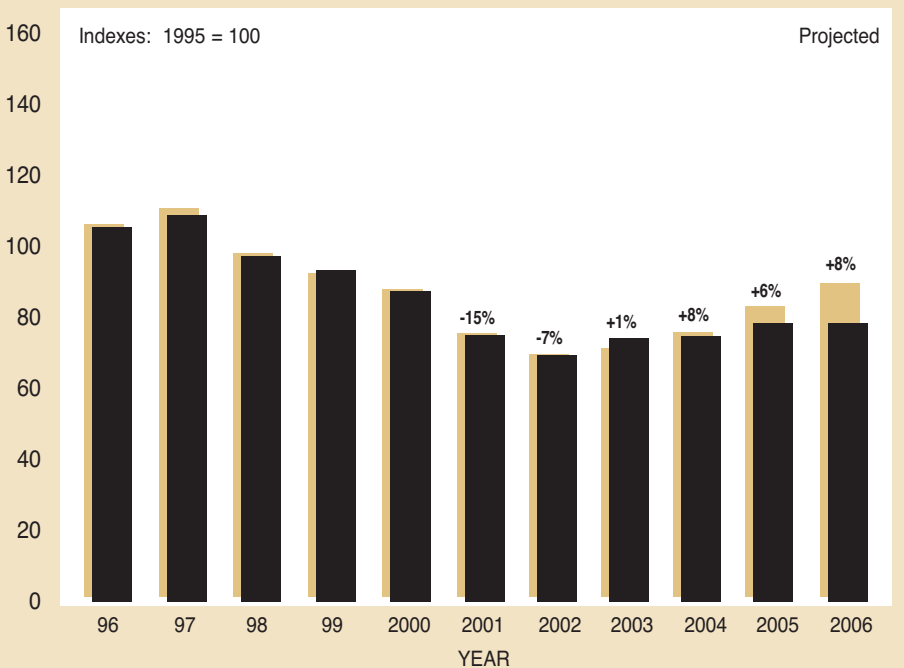
According to data from the Conference Board, consumer confidence increased to nearly a

four-year high in March when the index reached 107.2—compared to 102 in February. It's a bit surprising that higher fuel costs seem to have had a somewhat muted impact—at least so far.

### TOOLS, DIES, AND FIXTURES

Sales (orders) as a Percent of 1990

Percent Change from the Previous Year



Note: For all graphs in this Report, constant \$ bars reflect values after stripping away the effects of inflation or disinflation. Constant values are indexed as if there was no inflation or disinflation.

Department of Commerce data showed that consumer spending jumped at a 5.5 percent annual rate in this year's first quarter. Consumers were especially active in their purchases of durable goods, which soared at a 20.6 percent annual rate in this year's first quarter.

### **Factory Capacity Usage Up In March**

U.S. manufactures have significantly reduced their idle capacity. In April, factory output actually reached 81.9 percent, the highest level since 2000. Earlier, during this past recession, there were times when several industries were operating as low as 70 percent—and a few even lower for brief periods. The most recent low point occurred in the 2001-2002 time period.

Listed below are current capacity utilization rates for key NTMA industries.

The nearly 10 percent gain by the Aerospace sector is especially striking.

Keep in mind that historically

when individual sectors reach 80 percent of capacity utilization rates, they tend to stimulate greater interest in the purchase of manufacturing equipment. Presently, an increasing number of businesses are rushing to expand their operations to meet the rapidly increasing demand.

### **Unemployment Rate Falls Further**

The nation's unemployment rate declined in March and April to 4.7 percent. Some projections suggest that with jobs becoming more plentiful, more people will decide to resume looking for work—providing an added boost for the economy.

### **Industrial Production Continues to Expand**

The output of the nation's factories increased 4.3 percent over the previous four quarters—dating back to the second quarter of 2005. Production, which increased by 0.5 percent in March, expanded at an annual rate of more than

7 percent in the past six months.

### **Capital Equipment Orders Continue to Expand**

With the housing sector cooling, analysts will be focusing more attention on assessing the outlook for non-defense capital goods. That's the group of products lasting more than three years. Since the economy bottomed-out in 2002, sales of capital equipment have been slowly increasing. However, since mid 2005 the new orders rate has sharply accelerated.

### **Inventories Continue Near All-Time Lows**

Manufacturers' inventories continue at an unprecedented low level, falling to a ratio of 1.17 of February's sales. And as noted previously, that compares to typical past levels in the low 1.40's a few years ago.

Some observers are concerned that present inventories are too low. That could force more U.S. manufactures to increase their orders to off-shore suppliers, in the event that U.S. suppliers might be unable to react quickly enough to fill dwindling supply lines.

### **Forecasters see Continued Manufacturing Strength**

Several forecasts have projected increased confidence in the future economy. One of these is from the prestigious Business Round Table group, which expresses renewed optimism. It's CEO Economic Outlook Index, which is a measure of executive expectations for sales, capital spending, and hiring over the next several months rebounded sharply during last year's fourth quarter and continued to

SECTOR	CAPACITY USE RATES	
	2005.1	2006.1
Primary metal products	83.6	85.9
Fabricated metal products	74.2	76.9
Machinery	79.0	82.6
Computer and electronic products	75.1	77.8
Electrical equipment, appliances, and components	81.7	88.2
Motor vehicles and parts	80.7	78.1
Aerospace and miscellaneous transportation equipment	66.6	75.1

gain more ground in the first quarter of 2006.

Most of the participating executives expect strong sales and are especially optimistic about capital spending and employment. The latter outlook represents the most optimistic view since their survey began in 2002.

In another survey of expected future developments, a recent PriceWaterhouseCoopers (PWC) survey of 135 chief financial officers and managing directors of U.S. based companies also expanded their optimism in developing prospects for this full year. PWC summarized the findings of its survey as follows—"what were seeing is a major turnaround by leaders of U.S. businesses."

Their decision to keep expanding has been fortified by strong growth in profits, record cash flows, solid balance sheets, exceptionally low debt and easy borrowing. Those are solid supports for overall economic growth this year. Some of the credit for these aggressive corporate spending programs is attributable to reductions in corporate taxes.

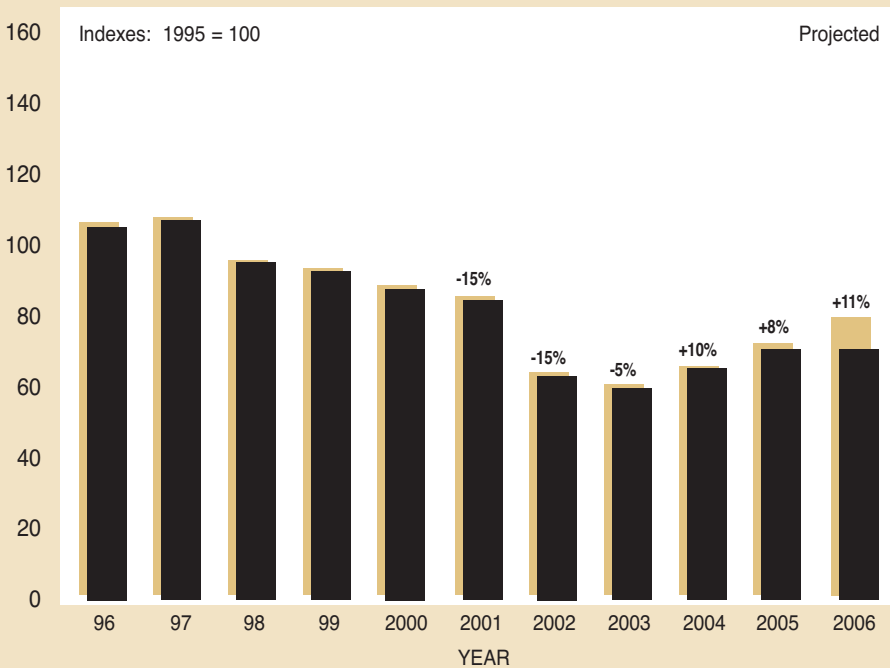
### ***Home Building Sales Finally Slowing***

In contrast to the increasing optimism in the manufacturing sector, surveys of the housing industry are considerably more guarded. For example, recent market surveys by The National Association of Home Builders (NAHB) confirms a considerable softness in new-home markets.

Clearly, that sector has been a pillar of strength for the economy over the past several quarters. A softening there will have a considerable negative impact on the overall economic outlook. This sector bears monitoring as it

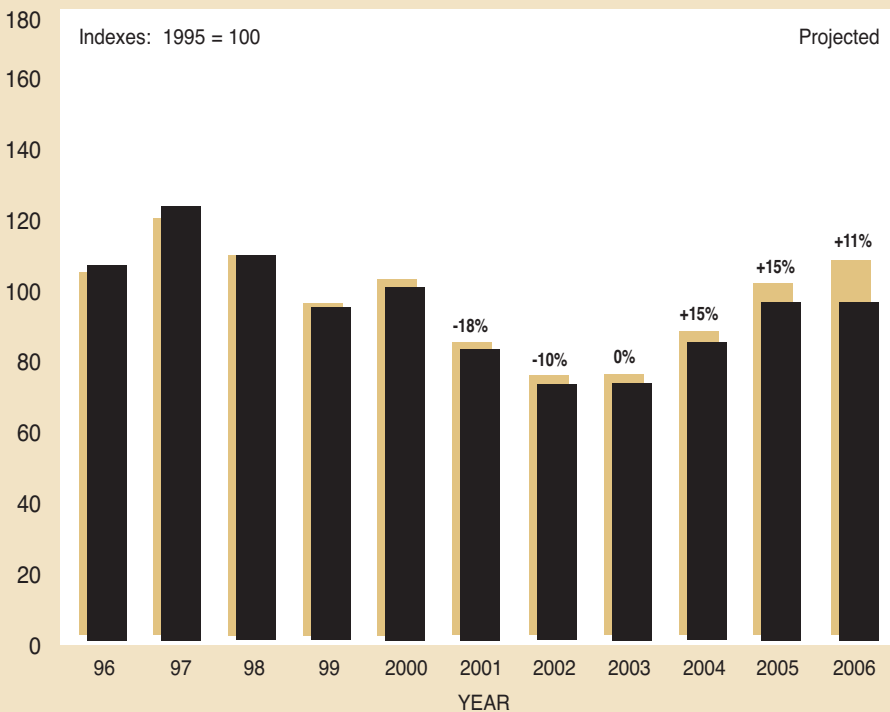
## **MOLDS**

Sales (orders) as a Percent of 1990      Percent Change from the Previous Year

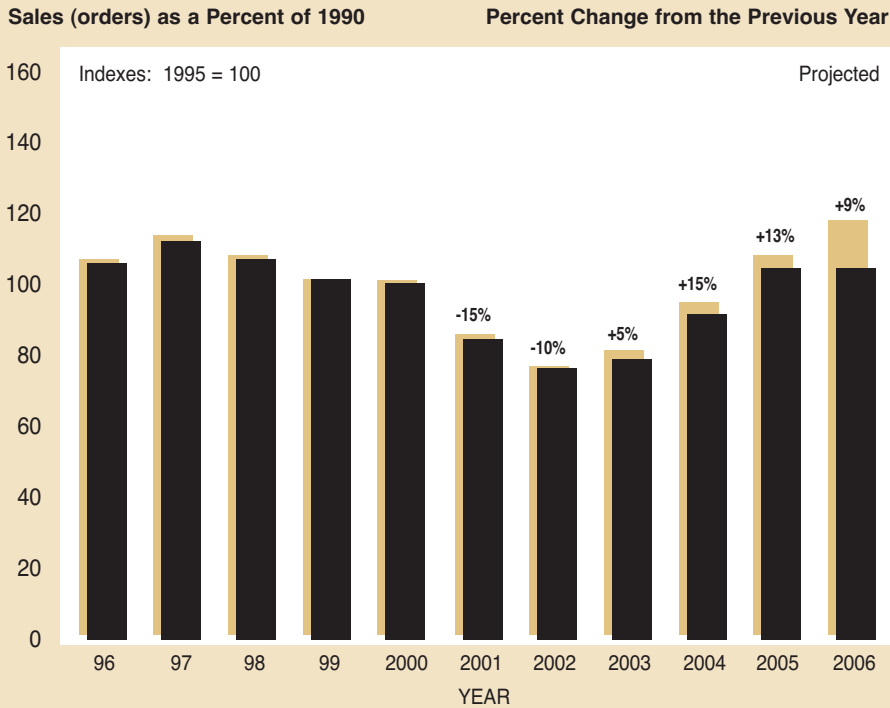


## **SPECIAL MACHINES**

Sales (orders) as a Percent of 1990      Percent Change from the Previous Year



## PRECISION MACHINING



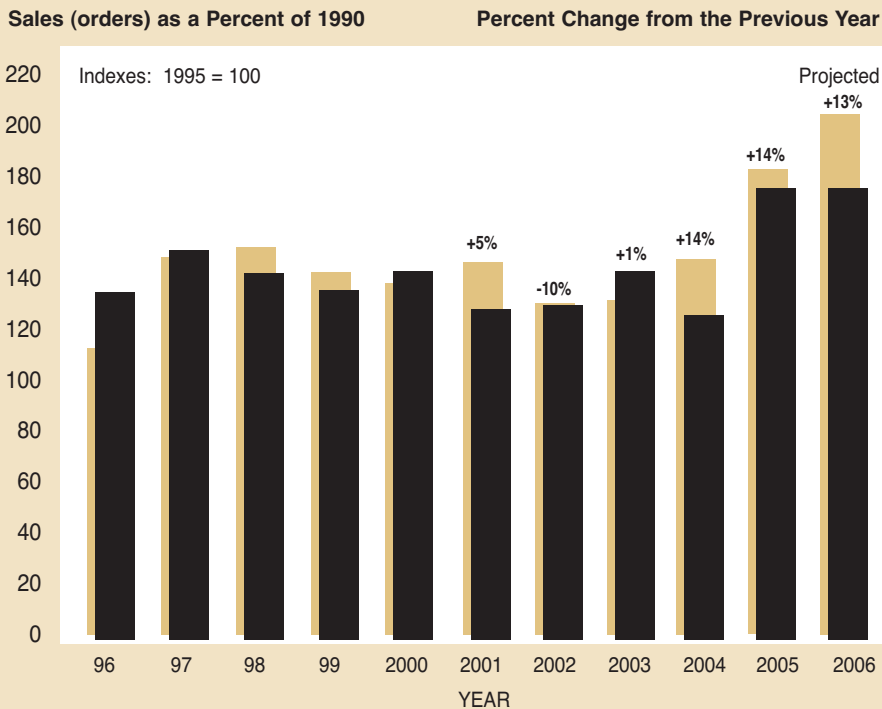
relates to the impact it may have on the manufacturing sector.

NAHB conducts monthly surveys measuring housing market conditions. The survey approach is somewhat similar to those used by the Institute of Supply Managers. (See below.)

In those surveys, NAHB also uses an index numbering system to sense changing conditions. Readings above 50 suggest that the outlook is positive; below 50 indicates the market is softening. Since the index stood at 72 last June, it has been declining—reaching 44 this past April. That is the lowest level in ten years. NAHB speculates that the index could fall further, but should remain above 40.

With the housing market apparently headed for a soft-patch, it is essential for other market segments to pick up the slack by boosting their sales—this will be a key sector to monitor.

## AEROSPACE MACHINING AND FABRICATION



### *Institute of Supply Management Surveys*

This is another very key sector to monitor. As noted before, the most up-to-date benchmark data for forecasting future market trends in U.S. manufacturing is the information developed monthly by the Institute of Supply Management. That association of 400 member companies conducts monthly surveys of market conditions, and their findings are immediately published on the first day after the close of each month.

That contrasts sharply with the long delays inherent in data collected and published by the government. Typically, those data are not available for at least two months after the close of the month for which the data applies.

The latest ISM Composite Index, referred to as the PMI (Purchasing Managers Index), gained ground in April, recording a 57.3. The PMI index is a composite average of all the 20 parameters measured by ISM. When that index is over 50 it signals growth in the manufacturing economy, and a reading below 50 signals decline.

Industries reporting increases in April include Primary Metals; Transportation & Equipment; Electronic Components; Fabricated Metals; Electronic Equipment & Components; Instruments & Photographic; and Rubber & Plastic Products.

### New Orders

ISM's New Orders Index registered a 57.6 percent in April. That

index is 0.8 of a percentage point lower than the 58.4 percent registered in March. April was the 36<sup>th</sup> consecutive month the index exceeded 50 percent.

### Production

ISM's Production Index in April was a very strong 60.4 percent. That was 2.9 percent higher than the 57.5 percent registered in March. That too was the 36<sup>th</sup> consecutive monthly growth. Of the industries reporting in April, 14 registered growth.

### Customer Inventories

The ISM Customer's Inventories Index was 46.5 percent in April, 1.5 percentage points lower than the 48 percent reported in March. The index indicates that the

respondents believe their customers do not have enough inventories on hand, i.e. inventories are too lean. (See Inventories discussion earlier in report.

### Prices Index

In April, the ISM Prices Index was 71.5 percent, indicating that manufacturers are paying higher prices on average when compared to March. While 37 percent of supply executives reported paying the same prices and 10 percent reported paying lower prices, the majority of the respondents—53 percent—reported that prices were higher than the preceding month.

### Backlog of Orders Index

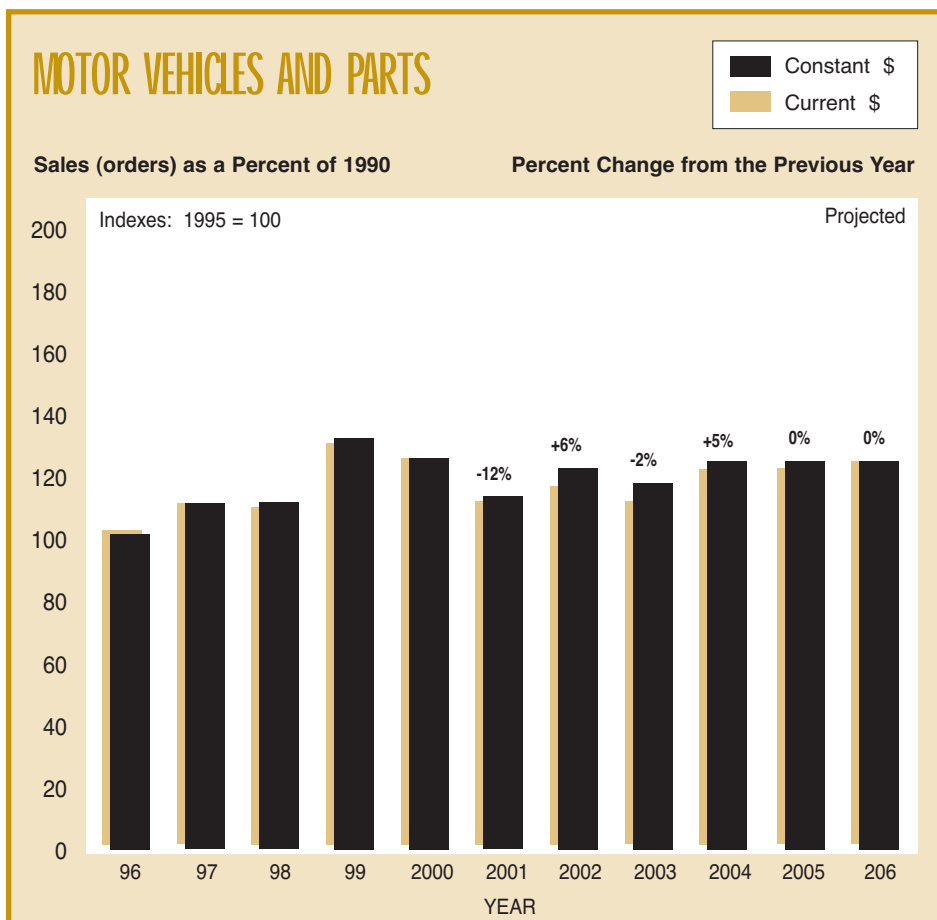
ISM's Backlog of Orders Index registered 57 percent, indicating that manufacturers' backlogs are still expanding when compared to March—which was 59.5 percent. Of the 86 percent of respondents who reported their backlog of orders data, 28 percent reported greater backlogs, 14 percent smaller, and 58 percent reported no change from March.

### Still More Imports

Imports of materials by manufacturers grew during April—as the Imports Index registered 59 percent. The index increased two percentage points since March.

### Exports Also Rising

ISM's New Export Orders Index registered 53.4 percent in April, a decrease of 3.9 percentage points when compared to March's index of 57.3 percent.



## AMT-AMTDA New Orders Survey

As noted previously, another leading indicator measuring the prospects for NTMA orders are the periodic surveys conducted by the Association of Manufacturing Technologies in conjunction with the American Machine Tool Distributors Association. Also as noted previously, there is a relatively strong relationship between the orders for various types of manufacturing machinery and certain products and services marketed by NTMA companies.

Examples include dies, molds, and to lesser extent special machines, etc. In many applications, the purchaser of the new machinery does in fact negotiate a separate purchase order for the tooling.

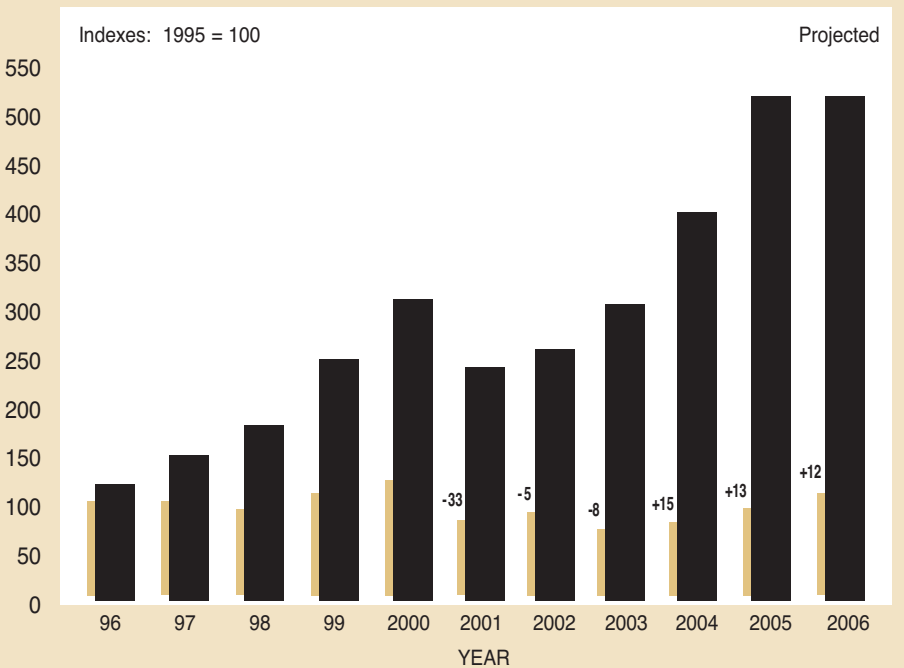
Most NTMA companies tend to market their products and services in a relatively narrow geographic region. The AMT-AMTDA new orders data, besides being tabulated for a survey total, are also divided into five distinct regions across the U.S. The latter feature allows NTMA companies to concentrate those marketing efforts in nearby regions.

Results of the latest survey continue to show growth in nearly all regions. Compared to sales in the first quarter of last year, the Northeast Region increased 26 percent this year, with sales of \$121 million. The Southern Region showed a slight decrease of 2 percent on sales of \$126 million. The Midwest region increased 7 percent on sales of \$262 million. The Central region increased 52 percent on sales of \$206 million, and the Western region increased 51 percent on sales of \$128 million.

## ELECTRONIC COMPONENTS

Sales (orders) as a Percent of 1990

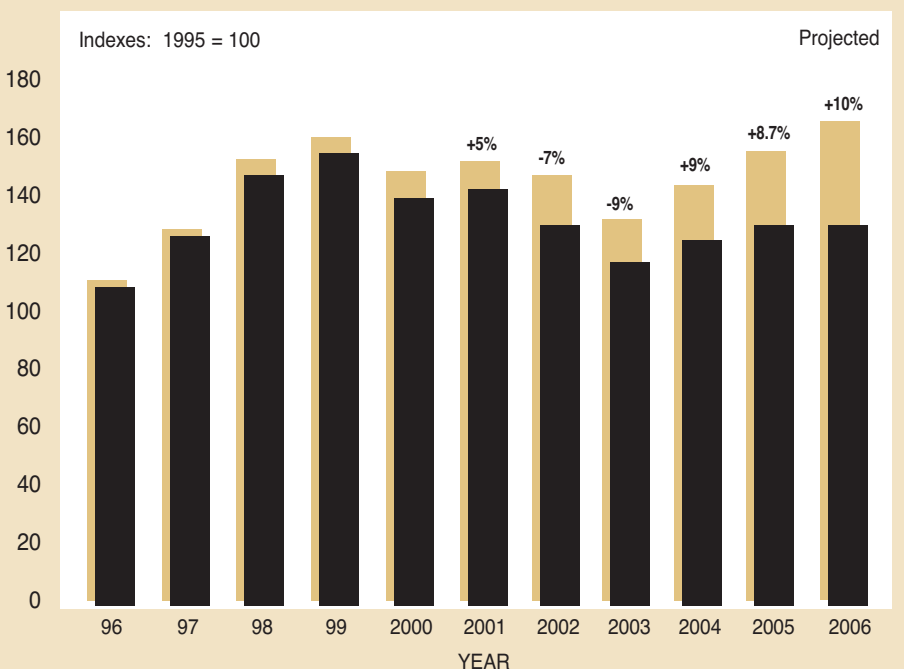
Percent Change from the Previous Year



## AIRCRAFT AND ENGINES

Sales (orders) as a Percent of 1990

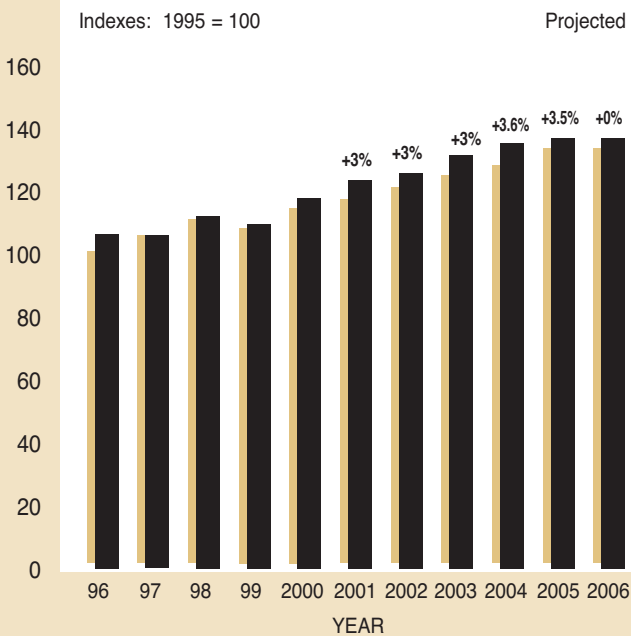
Percent Change from the Previous Year



## HOUSEHOLD APPLIANCES

■ Constant \$  
■ Current \$

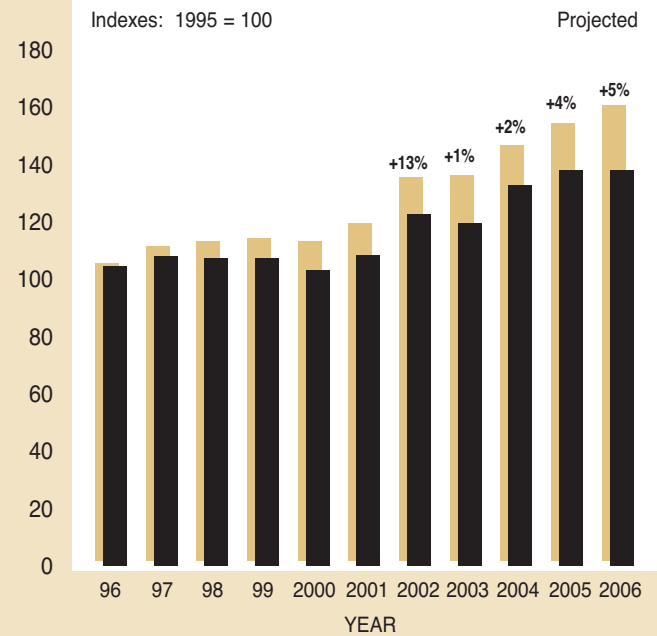
Sales (orders) as a Percent of 1990    Percent Change from the Previous Year



## MISSILES, SPACE VEHICLES AND ROCKET PROPULSION

■ Constant \$  
■ Current \$

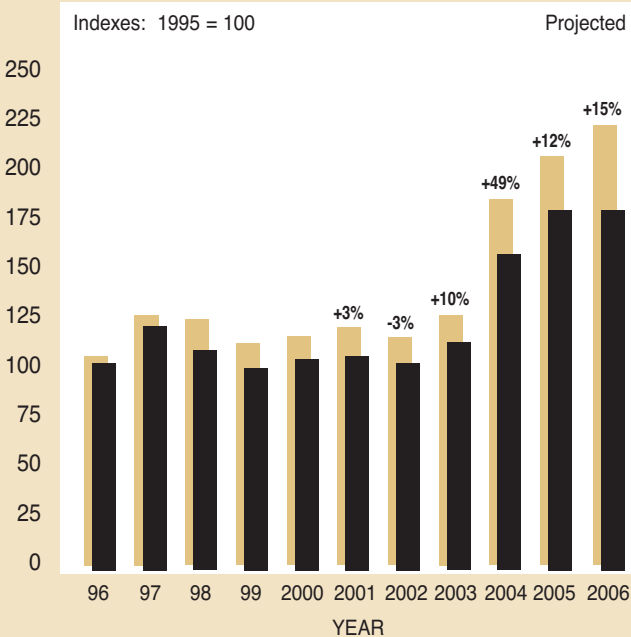
Sales (orders) as a Percent of 1990    Percent Change from the Previous Year



## CONSTRUCTION, OIL AND MINING EQUIPMENT

■ Constant \$  
■ Current \$

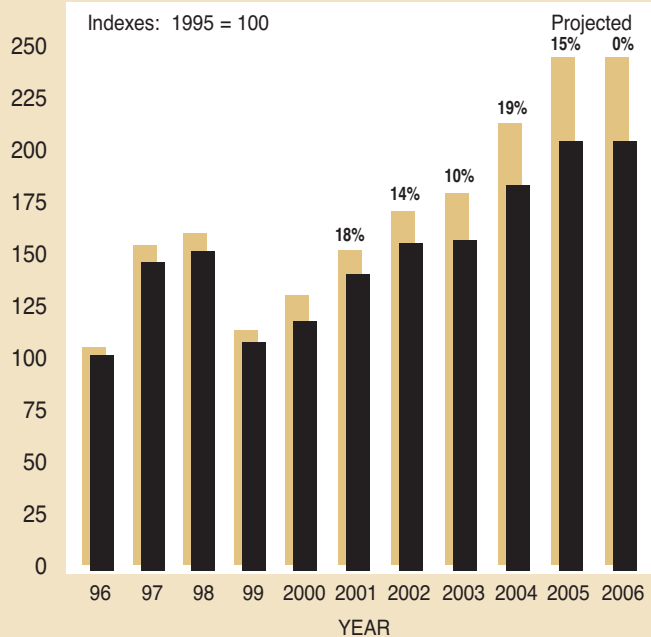
Sales (orders) as a Percent of 1990    Percent Change from the Previous Year



## FARM MACHINERY & EQUIPMENT

■ Constant \$  
■ Current \$

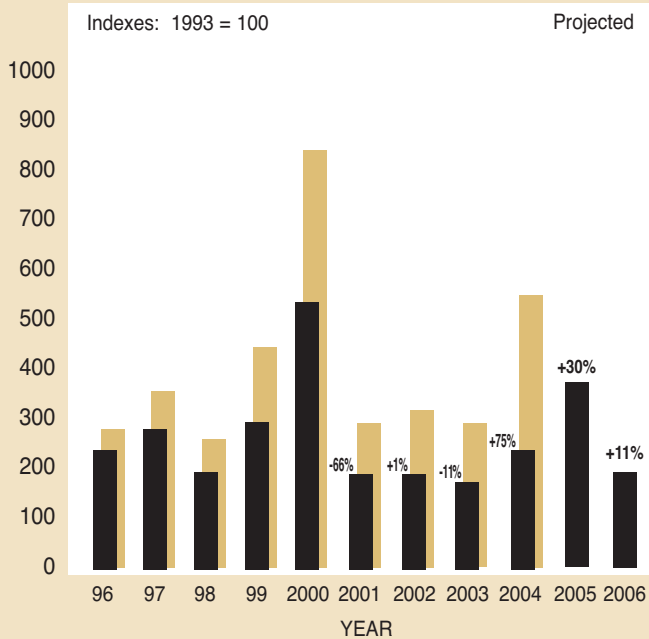
Sales (orders) as a Percent of 1990    Percent Change from the Previous Year



## MFG. EQUIPMENT FOR SEMICONDUCTORS

Constant \$  
Current \$

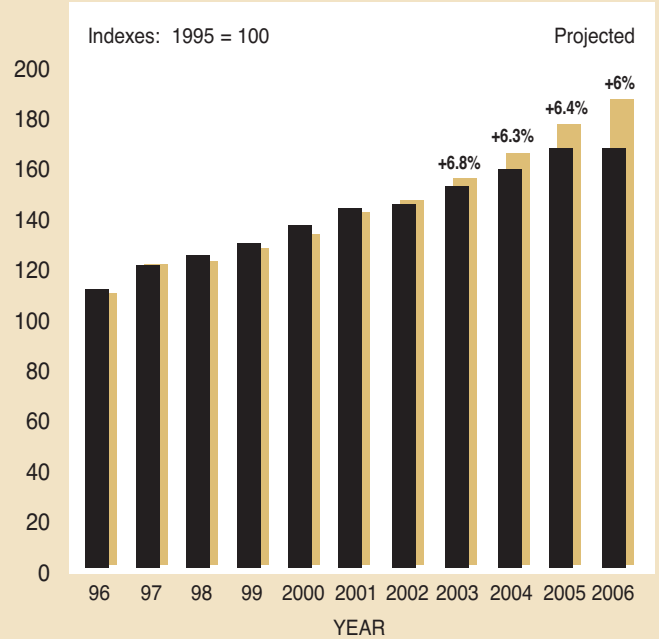
Sales (orders) as a Percent of 1990    Percent Change from the Previous Year



## MEDICAL INSTRUMENTS PRODUCTION

Constant \$  
Current \$

Sales (orders) as a Percent of 1992    Percent Change from the Previous Year



## CAR AND TRUCK PRODUCTION AND FARM WHEELED TRACTOR SALES

Units with 1990 = 100

Title	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006
Cars	98	96	90	91	92	79	82	73	68	64	60
Trucks	154	165	172	200	200	179	196	202	214	223	220
Tractors	106	120	127	122	134	141	142	170	195	224	225

## CHANGING TRENDS IN LEADING ECONOMIC INDICATORS FOR NTMA'S PRODUCTS AND SERVICES

Indicator	Direction: This Quarter Vs. Last	Rate of Change: This Quarter Vs. Last
Mfg. New Orders	Growing	Same
Producers Durable Equipment	Growing	Faster
Mfg. Durable Goods Orders	Growing	Faster
Factory Unfilled Orders	Growing	Faster
Manufacturing Profits-Actual	Growing	Same
Capacity Use in Mfg. in %	Growing	Increasing
Labor Cost/Unit of Output Mfg.	Same	Slower
Consumer Expectations	Growing	Reversal
Consumer Confidence from Conf. Board	Falling	Same
Industrial Production	Growing	Same
11 Leading Indicators	Slower	Reversal
Average Work Week in Mfg.	Growing	Slowing
Ratio of Mfg. Inventories to Sales	Falling	Same
ISM-PMI Index	Slower	Faster