

A visual essay:

**Post-recession trends
in nonfarm employment
and related economic indicators**

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- **Real GDP**
- **Corporate profits**
- **Unemployment Insurance (UI) claims**
- **The help-wanted index**
- **Manpower Inc.'s employment outlook survey**
- **Consumer confidence (appraisal of current employment conditions)**
- **Federal income tax withholdings**

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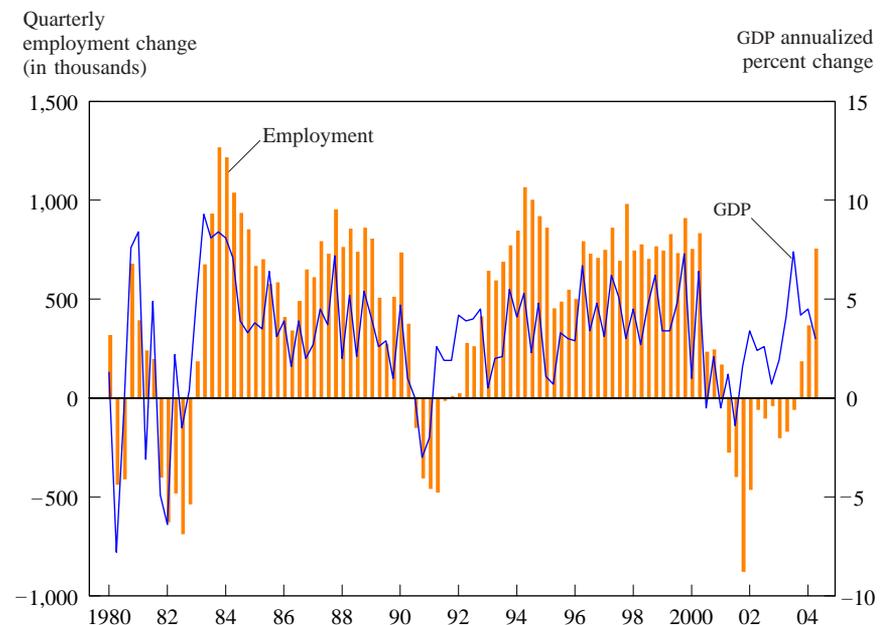
The economy entered a recovery in November 2001 following an 8-month recession, but the labor-market recovery began much later. Gross domestic product (GDP) and corporate profits had surged before payroll employment reached its August 2003 trough. Employment edged up by about 60,000 a month during the remainder of the year. Gains averaged about 225,000 a month during the first 5 months of 2004 before slowing in the summer. The post-recession disconnect between overall economic growth and the labor market was unusual. The following analysis reviews this apparent inconsistency, and also identifies a number of other broad labor-market indicators that paralleled the lagged recovery in payroll employment. Employment data used in this essay are from the Current Employment Statistics (CES) survey, a monthly survey of about 160,000 businesses and government agencies, which represent approximately 400,000 individual worksites. For more information on the CES, see *BLS Handbook of Methods*, chapter 2, on the Internet at <http://www.bls.gov/ces>

Real GDP

During and following the recessions of the early 1980s, the employment trend generally coincided with the trend in real GDP. In contrast, sustained employment growth lagged GDP growth by four quarters after the 1990–91 recession and by eight quarters after the 2001 recession. Overall, the downturn in employment associated with the 2001 recession was more prolonged than those associated with the recessions of the 1980s and 1990–91. (The National Bureau of Economic Research, the official arbiter of recessions, has designated these periods as recessions: January–July 1980, July 1981–November 1982, July 1990–March 1991, and March–November 2001.)

The 1990–91 and 2001 recessions were milder in terms of contracting GDP than those of the early 1980s. During the 1981–82 recession, employment contracted by 3 percent, compared with a mild 1 percent during the other three recessions since 1979.

1. Percent change in real gross domestic product and quarterly change in total nonfarm employment, seasonally adjusted



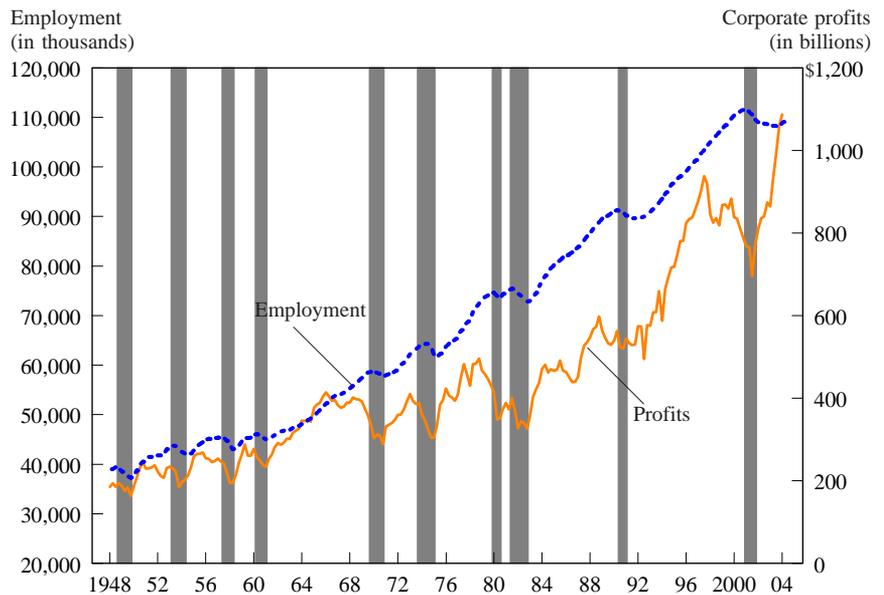
SOURCES: Bureau of Economic Analysis and BLS.

Corporate profits

Historically, private employment and real corporate profits behave similarly at the end of a recession. Both reach a trough as the recession ends and then recover quickly. At the end of the 1990–91 recession, both profits and employment continued to move in parallel, but were lagged in their recovery. The parallels broke down with the 2001 recession.

Leading into the 2001 recession, growth of corporate profits stalled and then exhibited a relatively sharp and deep decline. Employment declined as well during the recession, but not as drastically as corporate profits. Since reaching a trough in the third quarter of 2001, corporate profits have increased by 56 percent. Employment, on the other hand, remained essentially unchanged until late 2003. Rising productivity explains, at least in part, the divergence in profits and employment.

2. After-tax profits in constant (2000) dollars and quarterly averages of total private employment, seasonally adjusted

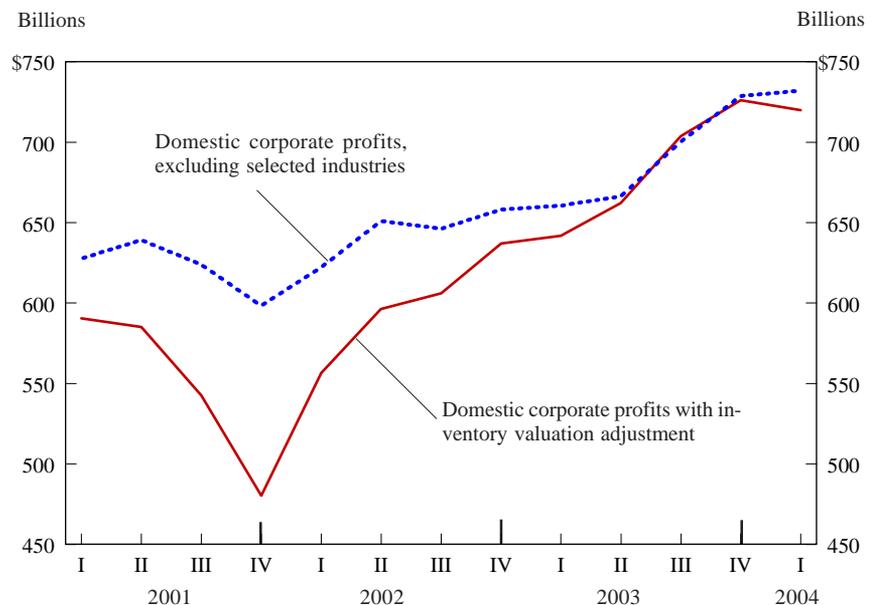


NOTE: Corporate profits were deflated using the Implicit price deflator for GDP, 2000 = 100. Shaded areas denote recessions.

SOURCES: Bureau of Economic Analysis and BLS.

Corporate profits declined substantially from the first to fourth quarter of 2001 and then recovered quickly. A large part of this swing is tied to the financial situation of three industry groups: information technology (IT)-related manufacturing, information industries, and transportation. (IT-related manufacturers produce information technology products. They are classified in computers and electronic products manufacturing [NAICS 334].) IT-related manufacturing and information industries felt the impact of the bursting technology bubble, whereas transportation was affected in part by the aftermath of the September 11th terrorist attacks. Corporate profits excluding those industries were much less volatile and much more in keeping with prior recessions.

3. Total domestic pre-tax profits and total excluding computer and electronic products, information, and transportation and warehousing

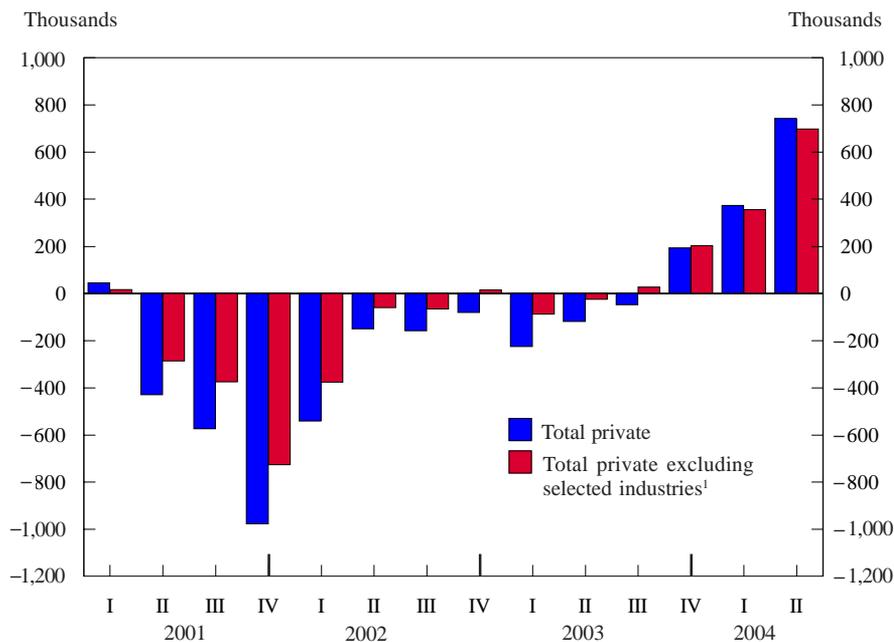


SOURCES: Bureau of Economic Analysis and authors' calculations.

The difficult financial situation in computer and electronic products, information, and transportation and warehousing resulted in cost-cutting initiatives that included numerous layoffs. As a percentage of private employment, these three industries accounted for approximately 9 percent of employment in the first quarter of 2001; however, they accounted for approximately 41 percent of declines in private industry employment through the third quarter of 2003.

Corporate profits

4. Quarterly employment changes in total private industries and total private excluding selected industries, seasonally adjusted



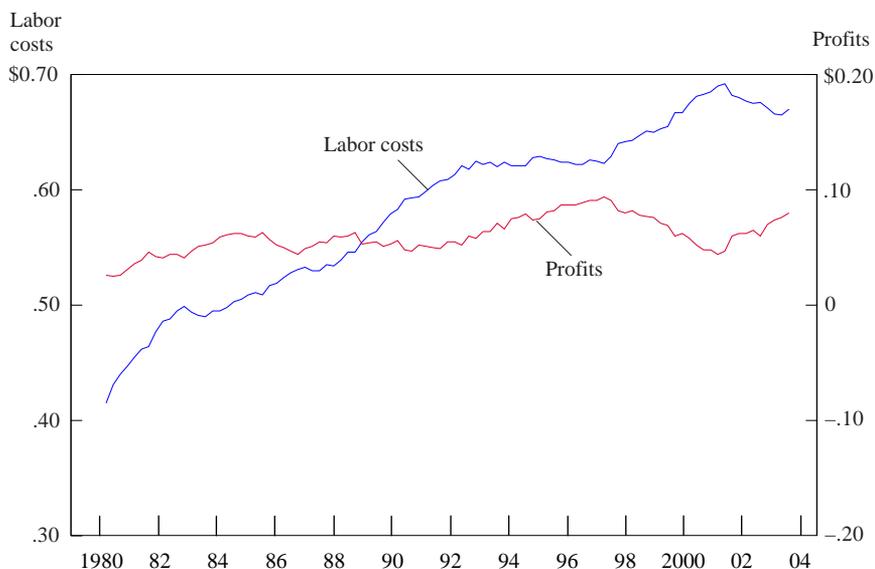
¹ Excludes computers and electronic products, information, and transportation and warehousing.

SOURCES: BLS and authors' calculations.

The third quarter of 1997 showed a distinct increase in labor costs per unit of real gross value added, which coincided with falling profits; this trend continued until the third quarter of 2001. (These measures are produced by the Bureau of Economic Analysis.) Over this timeframe, labor costs increased by 7 cents, while profits declined by 5 cents per unit of value added. The rising labor costs coincided with strong private employment growth, an average of 447,000 jobs a quarter.

This apparent tradeoff reversed itself in the fourth quarter of 2001. Unit profits began to increase, and unit labor costs decreased. From the third quarter of 2001 to the third quarter of 2003, profits per unit increased by 3 cents, while unit labor costs decreased by 2 cents. Private employment averaged declines of 288,000 per quarter over the same timeframe. This drop in unit labor costs is unusual, but is a way for firms to return to profit when their pricing power is weak. Price per unit of value added was flat between 2001 and 2003, so in order to increase profits, businesses cut costs, including the reduction of labor costs through layoffs.

5. After-tax profits and labor costs per unit of real gross value added of nonfinancial domestic corporate business, seasonally adjusted



NOTE: Profits are after taxes, inventory valuation adjustment, and capital consumption adjustment. The series are deflated such that the price of one unit of gross value added in 2000 equals \$1.

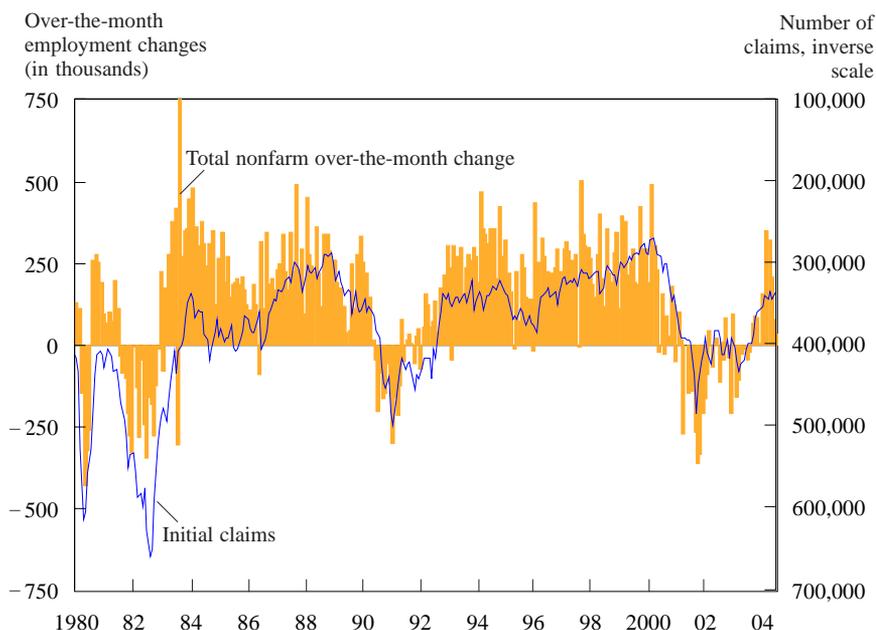
SOURCE: Bureau of Economic Analysis.

Unemployment Insurance (UI) claims

Initial UI claims and the over-the-month change of total nonfarm employment measure the flow of workers. The former measures the flow of laid-off workers claiming unemployment insurance compensation for the first week following a layoff. The latter measures the net flow of jobs onto payrolls. Not surprisingly, these flows are negatively correlated.

After the 2001 recession, initial UI claims hovered around 400,000 monthly, a somewhat lower level than during prior recessions. Claims did not fall and remain below 400,000 until the fourth quarter of 2003, coinciding with the return to growth in total nonfarm employment.

6. Monthly average of initial UI claims and monthly changes in total nonfarm employment, seasonally adjusted



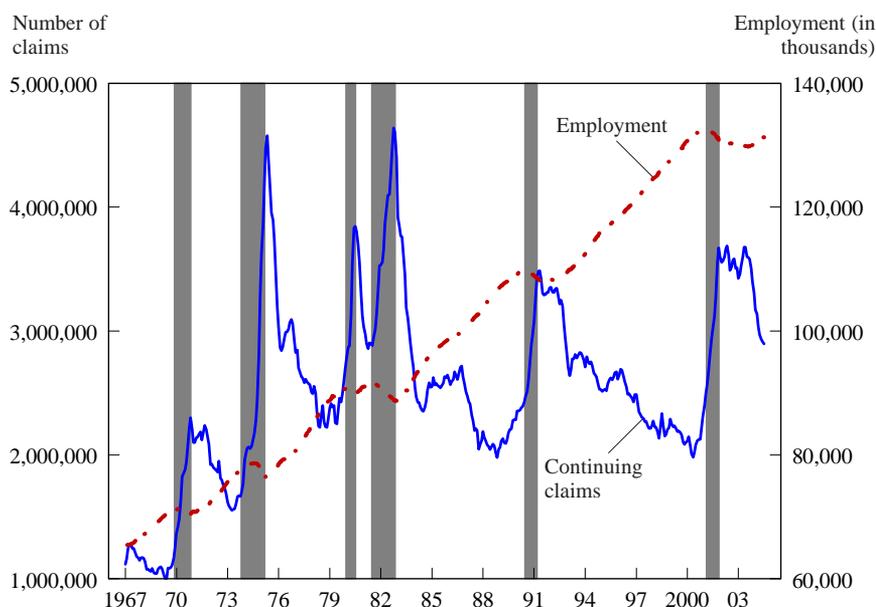
NOTE: The August and September 1983 over-the-month changes, -300,000 and +1.1 million, reflect a strike of 640,000 workers and their subsequent return.

SOURCES: DOL Employment and Training Administration and BLS.

The labor market's post-recovery stagnation is particularly evident in the continuing claims series. Like total nonfarm employment, continuing claims have tended to reach a turning point at the end of a recession, with employment then rising and claims declining. The pattern changed somewhat in the 1990-91 recession, as the drop in claims stalled between mid-1991 and mid-1992.

At the end of the 2001 recession, continuing claims reached 3.67 million, a plateau that extended through mid-2003. They did not decline steadily until September 2003, following the August trough in total nonfarm employment.

7. Monthly average of continuing UI claims and total nonfarm employment, seasonally adjusted



NOTE: Shaded areas denote recessions.

SOURCES: DOL Employment and Training Administration and BLS.

The help-wanted index measures monthly help-wanted advertising volume in 51 major newspapers across the United States. During the recessions of 1980, 1981–82, and 1990–91, a downturn in help-wanted advertising corresponded with job losses; conversely, an upturn in help-wanted advertising coincided with job gains. Newspaper job advertising began its most recent decline in 2000 and remained weak through 2003. Nonfarm payroll employment fell from early 2001 until late 2003.

Interestingly, the magnitude of decline in help-wanted advertising around the 2001 recession was more severe than the declines of the early 1980s and 1990s. In recent years, Internet-based job postings have become a popular method for employers to advertise job openings; some employers may substitute web-based postings for newspaper advertising. The shape of the help-wanted index indicates that newspaper job advertising notched up in early 2004, after showing little change in 2003. This small uptick coincided with strong gains in total nonfarm employment.

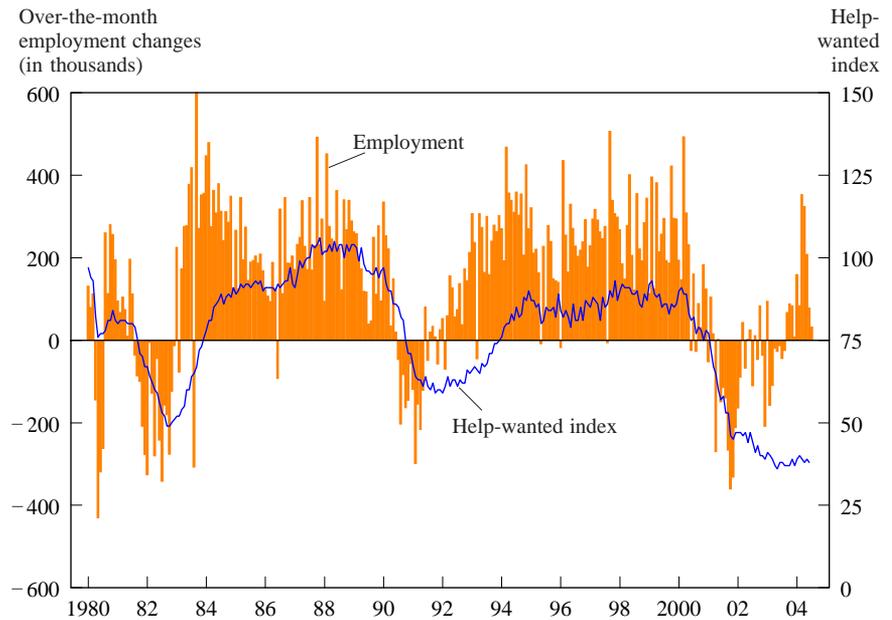
Manpower Inc.'s net employment outlook measures the difference between the percent of employers expecting to add jobs and those expecting to shed them. Curiously, in only one quarter since 1977 were there more firms planning to decrease their staffing levels than firms planning to increase them.

Trends in the net employment outlook correlate highly with quarterly changes in total nonfarm employment. A one-quarter lag in the employment outlook shows an even higher correlation. Not surprisingly, employers may develop their outlook for the upcoming quarter by looking at the one that has just ended.

Like total nonfarm employment, Manpower Inc.'s employment outlook behaved unusually after the 2001 recession. Although the outlook brightened somewhat in 2002, corresponding with relatively smaller declines in nonfarm employment, it dimmed again in 2003. At the end of the year and into early 2004, the outlook showed greater improvement, and total nonfarm employment began to recover.

The help-wanted index

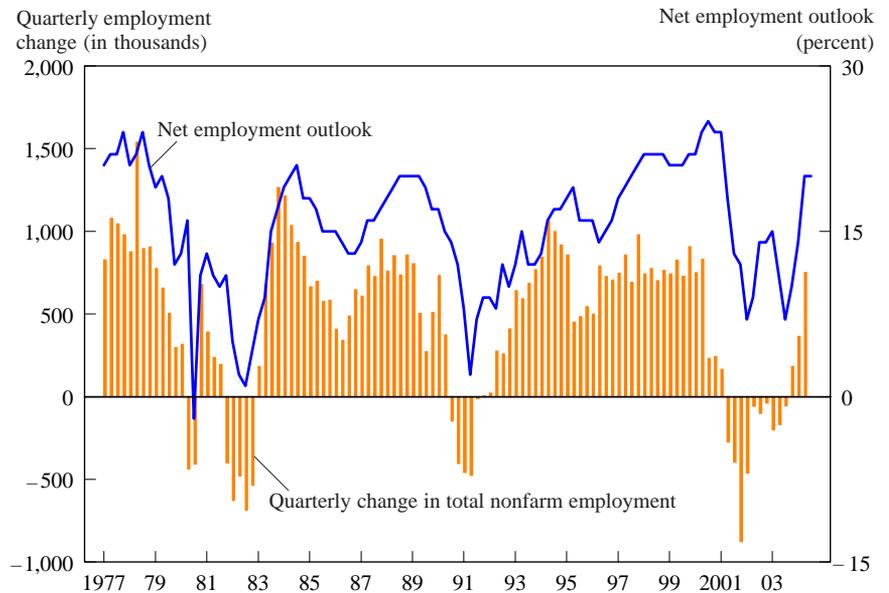
8. The help-wanted index and monthly changes in total nonfarm employment, seasonally adjusted



NOTE: The August and September 1983 over-the-month changes, -300,000 and +1.1 million, reflect a strike of 640,000 workers and their subsequent return.
SOURCES: The Conference Board and BLS.

Manpower Inc. employment outlook survey

9. Net employment outlook and quarterly changes in total nonfarm employment, seasonally adjusted

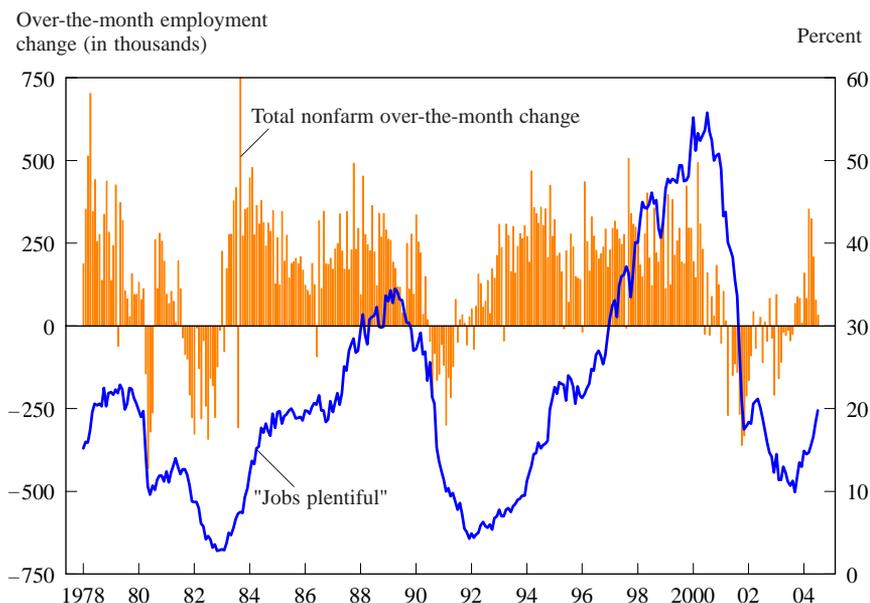


SOURCE: Manpower Inc. and BLS.

Consumer confidence (appraisal of current employment conditions)

As part of the Conference Board's monthly survey of Consumer confidence, respondents evaluate current employment conditions, judging jobs as either "plentiful," "not so plentiful," or "hard to get." Focusing just on those who see "plenty" of jobs, it is clear that the most recent economic recovery was not accompanied by an immediate improvement in the labor market. The proportion of respondents finding jobs plentiful recovered somewhat at the end of the 2001 recession, only to decline again during 2002 and through most of 2003. During the final months of 2003, it began to rise, coinciding with the first months of steady, though slow, growth in total nonfarm employment. It is worth remembering that BLS data may condition the public's perception of labor market conditions, especially in the case of people who are not actively looking, or know anyone actively looking, for work.

10. "Jobs plentiful" and monthly changes in total nonfarm employment, seasonally adjusted

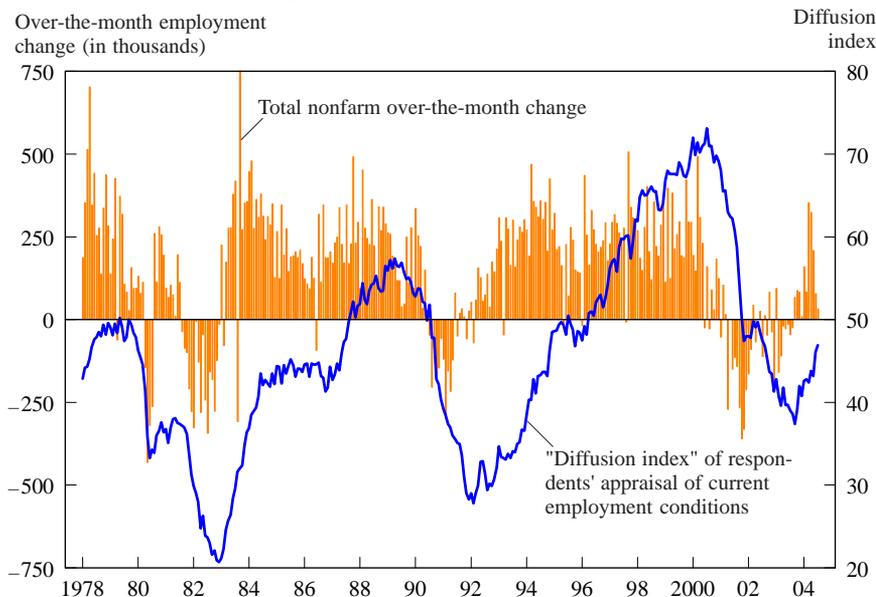


NOTE: The August and September 1983 over-the-month changes, -300,000 and +1.1 million, reflect a strike of 640,000 workers and their subsequent return.

SOURCE: Conference Board and BLS.

A broader measure of consumer confidence in the labor market would take into account all people, not just those who see "plenty" of jobs. Such a measure—a pseudo-diffusion index—can be calculated by weighting the proportion of people who respond "plentiful" as 100, "not so plentiful" as 50, and "hard to get" as 0, and summing the results. This index highlights the growing lag between the end of recessions and the related labor market recovery. In 1982, consumers noted a 1-month lag. After the 1990–91 recession came an 11-month lag, followed by a somewhat fitful recovery; consumers did not identify sustained labor market improvement until mid-1992. The lag following the 2001 recession was 22 months, as the diffusion index bottomed out in September 2003. This pattern parallels that seen in CES data; employment hit a low in August 2003.

11. Net appraisal of current employment conditions and monthly changes in total nonfarm employment, seasonally adjusted



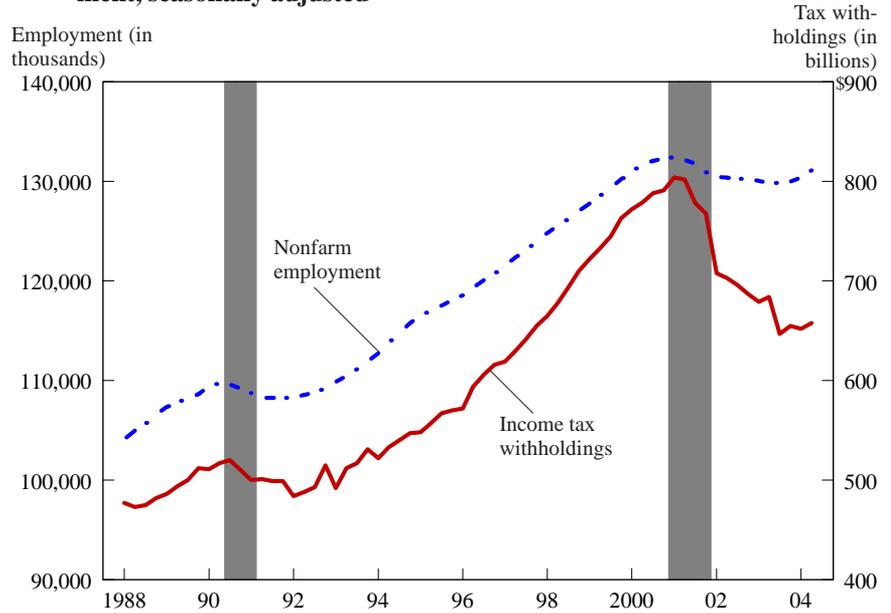
NOTE: The August and September 1983 over-the-month changes, -300,000 and +1.1 million, reflect a strike of 640,000 workers and their subsequent return.

SOURCE: Conference Board, BLS, and authors' calculations.

Income tax withholdings

Federal income tax withholdings and nonfarm employment had similar trends during the last two recessions. Both employment and withholdings peaked as the recessions began and reached low points after the recessions had ended. After the 1990–91 recession, there were no substantive job gains until the second quarter of 1992, coincident with a return to growth in income tax withholdings. There are not yet sufficient data to compare turning points in withholdings and employment for the period after the 2001 recession, although both data series declined through the third quarter of 2003 and have since regained some of their recession-related losses. Income tax cuts enacted in 2001 and 2003 are also a factor in the recent decline in withholdings.

12. Federal income tax withholdings and quarterly total nonfarm employment, seasonally adjusted



NOTE: Quarterly withholdings data are not available for years prior to 1988. Federal personal income tax withholdings were deflated using BEA's price index for Federal consumption expenditures and gross investment (2000 = 100). Shaded areas denote recessions.

SOURCES: Bureau of Economic Analysis, BLS, and authors' calculations.