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*In this issue:*  
The decline in inflation





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## MONTHLY LABOR REVIEW

OCTOBER 1986

VOLUME 109, NUMBER 10

Henry Lowenstern, Editor-in-Chief

Robert W. Fisher, Executive Editor

- 
- John F. Early and others 3 **A half-year decline in inflation: its antecedents and structure**  
The Consumer Price Index was almost unchanged in the first half, indicating 1986 will show the lowest inflation rate in 20 years; plunging energy prices offset increases for services
- Beth Harrison 15 **Spending patterns of older persons revealed in expenditure survey**  
New estimates point up differences in characteristics, incomes, and expenditures of younger and older populations within the larger group of persons 65 and older
- W. Schweke, D.R. Jones 18 **European job creation in the wake of plant closings and layoffs**  
Confronted with massive layoffs in recent years, European firms, and often governments, have taken a variety of initiatives to stimulate business growth and job creation

### REPORTS

- Henry Guzda 23 Constitutional convention marks golden anniversary of the UAW
- John D. Morton 26 BLS white-collar pay survey now covers small firms
- Sharon R. Cohany 28 What happened to the high school class of 1985?
- Tadd Linsenmayer 31 ILO adopts asbestos standard, focuses on employment issues

### DEPARTMENTS

- 2 Labor month in review
- 23 Conventions
- 26 Research summaries
- 31 Foreign labor developments
- 33 Major agreements expiring next month
- 34 Developments in industrial relations
- 38 Book reviews
- 41 Current labor statistics

# Labor Month In Review



**TRANSITION.** The Institute for Contemporary Studies published an evaluation of the role of unions in the 100th year after the founding of the American Federation of Labor. The book, *Unions in Transition* (ICS Press, 506 pages, \$29.95), edited by Seymour Martin Lipset of the Hoover Institution, Stanford University, includes contributions from more than a dozen academic observers and labor practitioners. Some excerpts:

**Walter Galenson, Cornell University:** American unions have survived and prospered because they . . . were flexible enough to alter their strategies to meet the demands of the time. The present soul-searching that is going on within the labor movement suggests that some new approaches may emerge, particularly if unions are to move beyond the bounds of their present sectoral confines.

**Leo Troy, Rutgers University:** As the American labor movement begins its second century, it apparently has entered a new stage in its history, a stage of permanent decline. Organized labor has lost millions of members since its peak in 1975, while its grip on the labor market has dropped to the levels of the Great Depression. The market seems to have rejected unions in the large sectors of the private economy and in growth areas of the country.

**Ray Marshall, University of Texas:** Most economic and technological trends are against unions as traditionally organized.

The unions will therefore need to develop new procedures to deal with the internationalized information world. Because of the importance of collective bargaining and free labor movements for the Nation's economic, political, and social health, it is in the public interest to encourage these adjustments and strengthen the workers' right to decide for themselves whether or not they want to be represented by unions.

**Richard B. Freeman, Harvard University:** In the world of perfect full employment and competitive markets, unions would be unnecessary. In the real world in which we live unions can and generally do perform valuable economic functions. An economy is likely to operate efficiently when there is a sufficient number of union and of nonunion firms to offer alternative work environments to workers, innovation in workplace rules and conditions, and competition in the market.

**Seymour Lipset, Stanford University:** Most Americans who are normally sympathetic to the needs of the weak and the underprivileged do not classify labor organizations among the oppressed. Rather, like big business, they are seen as powerful and essentially self-serving. But corporations have an advantage in that the public also thinks they inherently contribute to the community in the form of jobs, goods, and services. Unions are perceived as worse than business in two respects; first, they are viewed as giving low priority to the public interest and as working against the good of the whole

society, and second, their leaders are believed to be exceptionally corrupt and unethical. In short, the principal virtue of unions is that they serve the interest of their members. Their principal defect is that, by doing exactly that, unions seem to do little to benefit the public interest.

**Lane Kirkland, AFL-CIO:** Any analysis of the state of American unions, especially one pointing to or predicting their decline, should include the following disclaimer in the interest of accuracy: It has all been said before.

Labor's obituary has been written at least once in every one of the 105 years of our existence, and nearly that many causes of death have been diagnosed. Some of our most prominent labor journalists have earned their keep by writing of our demise each Labor Day, just as some of our better-known labor economists and academics have earned tenure by publishing predictions that unions would perish. It seems we must be forever perishing so that others may be forever publishing.

**Alexander Trowbridge, National Association of Manufacturers:** Labor and management are at the crossroads in collective bargaining. Certainly, the growth of participative management mechanisms, gainsharing, employment security, and employee identification with productivity and profits of a company justify some optimism that both labor and management have seen the realities of global competition and its impact, as well as the responses that are necessary to successfully face this competition. □

# A half-year pause in inflation: its antecedents and structure

*The Consumer Price Index was almost unchanged during the first half, suggesting that 1986 will show the lowest inflation rate in 20 years; plunging energy prices offset strong increases for some services*

JOHN F. EARLY, WALTER LANE, and PHILIP STURM

Inflation as measured by the Consumer Price Index for all Urban Consumers (CPI-U) declined at a seasonally adjusted annual rate of 0.2 percent during the first 6 months of 1986. While a continuation of this pattern is unlikely throughout the remainder of the year, the resulting change for 1986 will probably be the smallest annual increase since the first half of the 1960's.<sup>1</sup>

The first-half decline reflected the sharp drop in crude oil prices, as the index for energy commodities—fuel oil, coal, bottled gas, and motor fuels fell at an annual rate of 40.2 percent in the first half of 1986. Prices for used cars and grocery store foods also declined in the first half. On the other hand, shelter costs continued to advance at an annual rate of about 5 percent. The index for all items excluding food, shelter, energy, and used cars increased at an annual rate of 4 percent during the first 6 months. Within this group, however, price movements for commodities and for services continued to diverge. Price increases in the goods sector moderated further, but prices for services, in particular medical care, accelerated. (See table 1.)

## Background 1960 to 1981

The early 1960's were characterized by rapid economic expansion, with prices increasing at an annual rate of 1.3 percent for the 5-year period which ended in December

1965. (See chart 1.) Price pressures developed in the late 1960's, however, as expenditures for the Vietnam War stimulated an economy already at nearly full employment. The rate of inflation in consumer prices rose from less than 2 percent in 1965 to more than 6 percent in 1969.

From chart 2, one can identify the general composition of price change in each of these periods. The top line displays the average annual rate of change for the all-items CPI-U during the periods identified on the horizontal axis. This seasonally adjusted overall inflation rate can be constructed as the sum of the individual contributions of four major classes of consumer expenditures—energy, food, shelter, and all other—as follows:

Period	All items	Effect on all items			
		Energy	Food	Shelter	Other
Dec. 1960–					
Dec. 1965	1.3	.023	.406	.245	.626
Dec. 1965–					
Dec. 1969	4.3	.133	.937	1.115	2.115
Dec. 1969–					
Aug. 1971	4.8	.251	.707	1.274	2.568
Aug. 1971–					
July 1973	4.4	.280	1.975	.879	1.266
July 1973–					
Dec. 1974	12.0	1.517	3.694	2.470	4.319
Dec. 1974–					
Dec. 1976	5.9	.642	.869	1.237	3.152
Dec. 1976–					
Dec. 1978	7.9	.581	1.885	2.215	3.219
Dec. 1978–					
Sept. 1981	12.2	1.990	1.633	4.664	3.913
Sept. 1981–					
June 1986	3.4	-.195	.502	1.027	2.065

John F. Early is Assistant Commissioner for Consumer Prices and Price Indexes, Bureau of Labor Statistics. Walter Lane and Philip Sturm are economists in that office.

From the chart, one can see that the acceleration in prices from the first half to the second half of the 1960's was widespread, except that energy prices had very little impact.

The recession which began late in 1969 caused the rate of price increase to subside only partially, and much of that reduction was due to the effect of declining mortgage interest rates on the shelter component of the CPI. In reaction to the failure of inflation to abate swiftly and fully, President Nixon announced a wage and price freeze on August 15, 1971. The initial price freeze and subsequent Phase II economic controls were accompanied by a lower rate of inflation during the final months of 1971 and throughout 1972. Prices, however, started to rise more quickly in 1973, and further inflation followed with the relaxation of controls in August and the oil embargo in October. Although the direct effects of the oil embargo on inflation were substantial, they were far from unique. Sharply higher mortgage interest rates and house prices drove up shelter costs; food prices, influenced in part by worldwide commodity inflation, rose rapidly; and prices for most other goods and services began to accelerate.

Inflation climbed to double-digit rates during 1974 and registered what was then the largest calendar year change in the history of the CPI, except for the inflationary periods directly associated with the two World Wars. With the steep

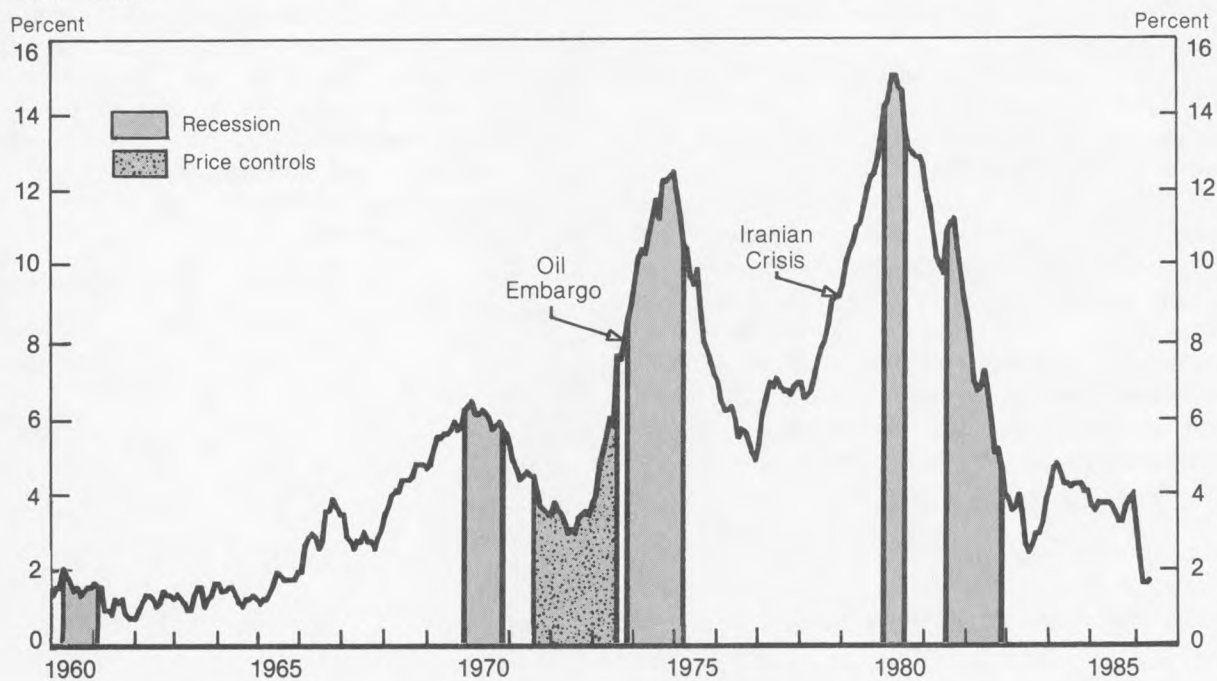
**Table 1. Annual percent changes for selected groupings of consumer prices, 1982-86**

Item	12 months ended December—				6 months ended June—
	1982	1983	1984	1985	1986 <sup>1</sup>
All items .....	3.9	3.8	4.0	3.8	-0.2
Food .....	3.1	2.6	3.8	2.7	1.0
Food at home .....	2.2	1.9	3.6	2.1	-.5
Food away from home .....	5.0	4.1	4.2	3.8	4.1
Energy .....	1.3	-.5	.2	1.8	-24.1
Energy commodities .....	-5.0	-3.2	-1.9	3.4	-40.2
Energy services .....	14.1	4.1	3.4	-0.5	3.5
Shelter .....	2.4	4.7	5.2	6.0	5.1
Used cars .....	10.9	14.4	7.0	-1.9	-7.1
All other items .....	5.6	4.1	4.1	4.2	4.0
Other commodities .....	4.1	3.3	2.3	3.0	1.6
Other services .....	7.3	4.9	6.0	5.4	6.3

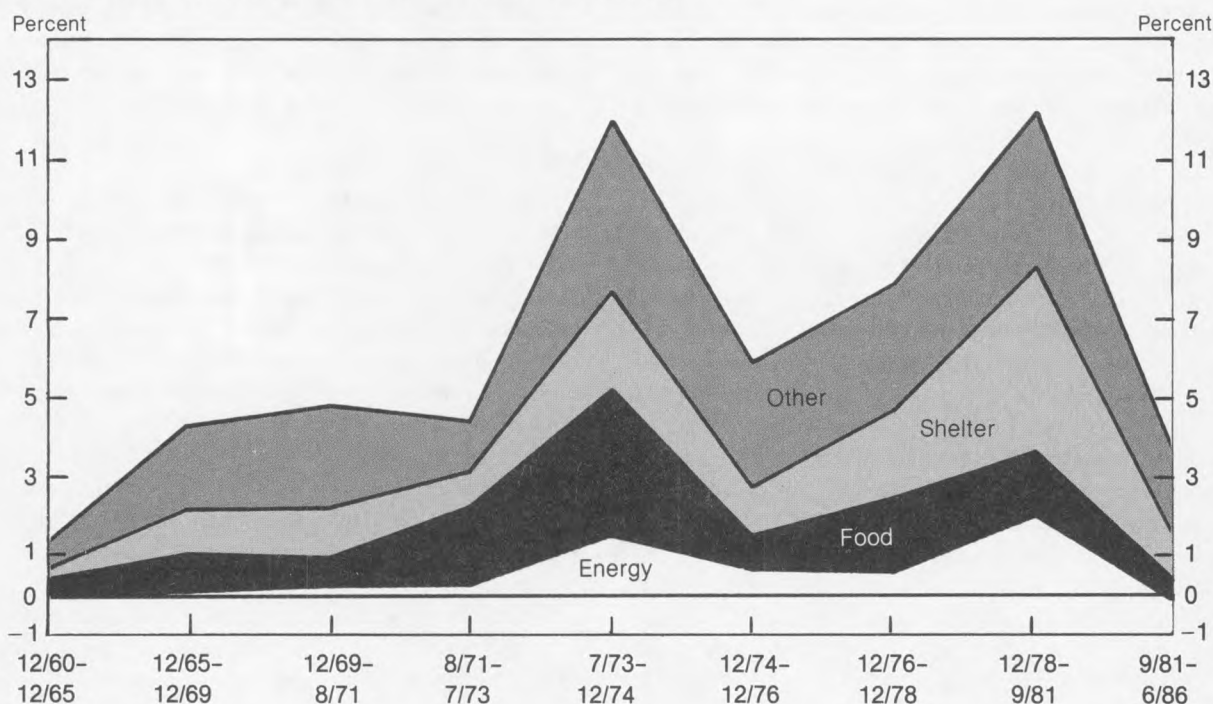
<sup>1</sup> Seasonally adjusted annual rate of change.

recession of 1973-75, inflation moderated substantially so that, by the end of 1976, consumer prices were rising at an annual rate of less than 5 percent. With the economic expansion in 1977, prices began to accelerate. Then sharp increases in energy prices were fueled by events associated with the Iranian crisis, and rapid price rises for food and shelter costs followed, pushing consumer price rises to unprecedented peacetime rates during 1979, 1980, and, indeed, for most of 1981.

**Chart 1. Consumer Price Index for All Urban Consumers, 12-month percent changes, 1960-1986**



**Chart 2. CPI average annual rate of change for selected periods by the effects of major components, December 1960 to June 1986**



### Deceleration since 1981

Two back-to-back recessions (1980 and 1981–82), a tight monetary policy, and lessened control by OPEC of world petroleum supplies all contributed to a rapid reduction in the rate of inflation beginning in the fourth quarter of 1981. This moderation in prices brought an end to the “ratchet phenomenon” that had characterized inflation since 1960. Before 1981, each succeeding low point in inflation was higher than the preceding low, and each high point was also higher than the preceding high. (See chart 1.) The 3.9-percent price increase for 1982 was the smallest annual increase in 10 years.

The price deceleration that occurred in the 57 months through June 1986 was particularly apparent in the energy, shelter, and food components of the CPI. (See charts 2 and 3.) Advances in these items had, of course, been responsible for much of the increase in the CPI in the past decade. Unlike earlier episodes, however, the index excluding the energy, shelter, and food components also moderated substantially, rising at a 4.8-percent seasonally adjusted annual rate during the 57 months through June 1986, compared with a 9.6-percent increase for the 12 months ended in September 1981. Chart 3 provides more detail than chart 2 on the post-1981 period. The data are as follows:

Period	All items	Effect on all items				
		Energy	Food	Shelter	Other commodities	Other services
Sept. 1981–						
Dec. 1982 ..	4.0	.372	.488	.724	1.057	1.359
Dec. 1982–						
Dec. 1984 ..	3.9	-.015	.606	1.071	1.059	1.179
Dec. 1984–						
Sept. 1985 ..	3.2	.143	.296	1.284	.464	1.013
Sept. 1985–						
Dec. 1985 ..	5.3	.402	1.022	1.405	1.103	1.368
Dec. 1985–						
June 1986 ..	-.2	-2.580	.169	.971	.019	1.221

The slowdown in food prices preceded the deceleration in the overall CPI. For the 12-month period ended in September 1981, grocery store food prices had increased 5.5 percent, a rate half that of the overall index. Increases in each of the following 4 years were also less than those for the overall index. For the September 1981 to June 1986 period, grocery store food prices advanced at an average annual rate of 2.1 percent and the overall food component at a 2.8-percent rate.

The shelter component registered steep advances throughout most of the period from 1978 through September 1981. The rate of increase fell off sharply beginning in the fourth quarter of 1981, principally due to the behavior of house prices and mortgage interest rates, and advanced at an annual rate of 2.2 percent from September 1981 through

December 1982. Until January 1983, the CPI used an asset approach to measure shelter costs of homeowners. The asset treatment covered house prices, mortgage interest rates, property insurance, property taxes, and maintenance and repair costs. In January 1983, BLS introduced an improved measure of shelter costs for homeowners in the CPI-U, using a rental equivalence approach. During the first 3½ years of the new measure, shelter costs rose at an annual rate of 5.3 percent.

Energy costs declined at an annual rate of 2.1 percent for the 57-month period through June 1986, compared with an increase at a 22.9-percent rate in the 33-month period from December 1978 to September 1981. Although charges for gas and electricity continued to increase at double-digit rates through 1982, they slowed considerably beginning in 1983, rising at an annual rate of 2.6 percent in the 42 months ended in June 1986. Prices for petroleum products peaked in early 1981 and then generally declined, with the exception of temporary spurts associated with short-term shortages and a 5-cent-a-gallon gasoline tax increase in April 1983. The sharpest drop occurred during the first 6 months of 1986. As of June 1986, fuel oil prices were 35.2 percent lower and gasoline prices 31.2 percent below their 1981 peak levels.

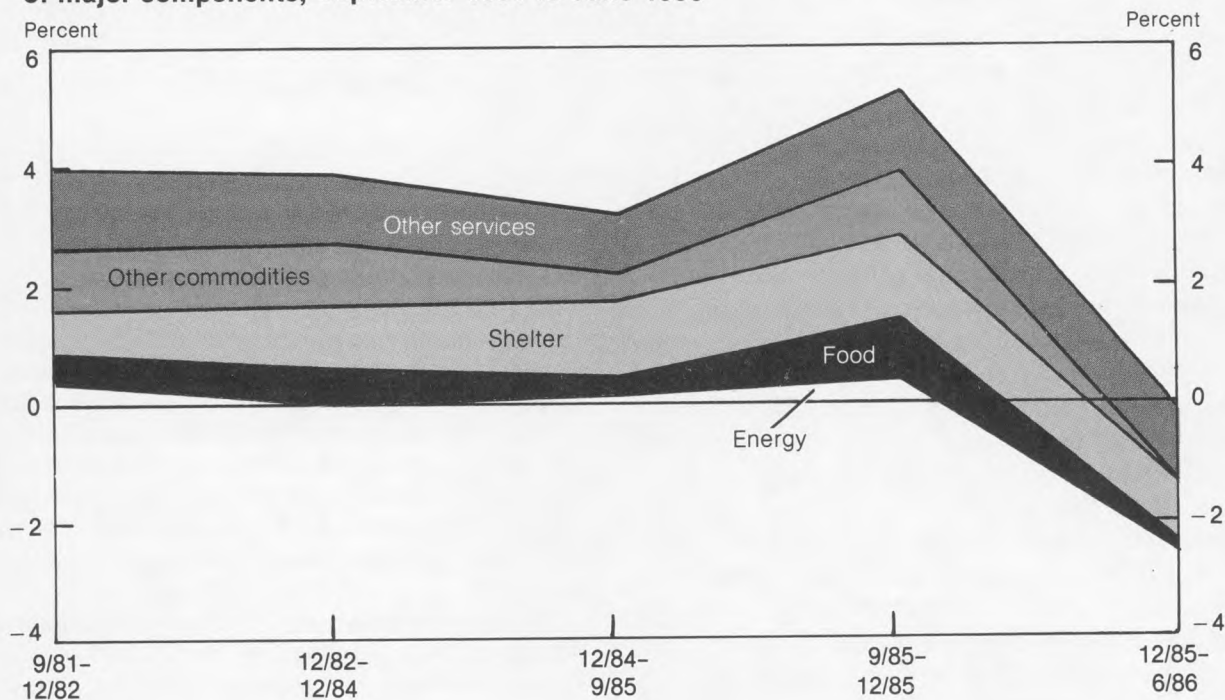
The index for items other than food, shelter, and energy slowed more gradually than the excluded components. The price moderation in this group has been steady since 1981,

when these prices rose, on average, by 9.4 percent. They increased less each year than in the preceding one, and by the end of 1985 the annual change was 3.7 percent. Within the group, however, price movements for commodities and services have diverged. Initially, both groups slowed from their peak rates; further deceleration has occurred primarily in the goods sector, however, with service prices continuing to advance at a rate of more than 5 percent.

**Status at midyear**

Over the first 6 months of 1986, plummeting oil prices have dominated the movement of the CPI. Such dramatic influence by a single component seems less likely in the coming months, but aggregate indicators of both material and labor costs portend continued consumer price moderation. Producer prices for nonenergy commodities at the crude, intermediate, and finished stages of processing have either declined or increased very moderately over the past 12 months. Measures of labor costs also indicate a lack of current pressure on prices. The Employment Cost Index has decelerated steadily since peaking at near double-digit rates in 1980, with total compensation for private industry workers advancing by only 3.8 percent in the 12 months ended in June 1986. In addition, sluggish growth in output in the first half of 1986, with less than full utilization of resources—at midyear, capacity utilization rates were less

**Chart 3. CPI average annual rate of change for recent periods by the effects of major components, September 1981 to June 1986**





than 79 percent and unemployment stood just under 7 percent—would appear to preclude any immediate cost pressures.

However, policymakers have taken measures designed to stimulate growth by depreciating the dollar and lowering interest rates. These policies could contribute to an increase in the CPI inflation rate in the longer term. To date, however, there has been little evidence that the devaluation of the dollar has had much impact on consumer prices and the declines in interest rates have not yet sparked an acceleration in output.

The following discussion is a detailed sector-by-sector assessment of the status of consumer price change in mid-1986.

### The plunge in energy prices

The decline in the overall CPI during the first 6 months of 1986 was attributable to the sharp drop in energy prices—down 24.1 percent at an annual rate. (See chart 3.) The CPI excluding energy, during this period, advanced at a 3.1-percent annual rate. Prices for commodities and services within energy as well as within the overall CPI, continued to diverge. Principally because of OPEC's decision in late 1985 to abandon formally production quotas, prices for energy commodities plunged downward as contracted crude oil prices fell from \$28 a barrel to less than half that at the end of June. Reflecting this drop, retail gasoline prices fell 22.3 percent and fuel oil prices, 27.6 percent, from December 1985 to June. From 1967 to the spring of 1981, prices for energy commodities rose about 80 percent faster than prices for nonenergy consumer items. As a result, the prices of energy commodities relative to the prices (on average) of nonenergy items were nearly 80 percent greater in early 1981 than in 1967, the base year for the CPI. By June of 1986, however, energy CPI commodity prices had fallen from their peaks and the prices for energy commodities stood in the same relationship to prices for nonenergy items as they had in 1967. (See chart 4.)

The index for energy services—natural gas and electricity—registered a moderate increase during the first 6 months of 1986. Charges for electricity rose at an annual rate of 4.8 percent and those for natural gas increased at a 1.6-percent annual rate. From 1967, the prices for energy services relative to those for nonenergy items rose somewhat more than half as fast as relative prices for energy commodities, peaking in mid-1983. Since then, charges for energy services have eased slightly, and by June 1986 they were in the same proportion to nonenergy prices as they had been in the spring of 1982.

### Continuing rise in shelter costs

The movements in the CPI for shelter during the last 5 or 6 years are, on the surface, somewhat puzzling. As already noted, shelter costs were a major cause for the double-digit inflation during 1979, 1980, and first part of 1981. After

**Table 2. Annual changes in consumer prices for shelter, 1980–86**

Item	12 months ended December—					6 months ended June—	
	1980	1981	1982	1983	1984	1985	1986 <sup>1</sup>
Official CPI for shelter . . . . .	15.1	9.9	2.4	4.7	5.2	6.0	5.1
Shelter index on rental equivalence basis . . . . .	9.0	8.8	6.2	4.7	5.2	6.0	5.1
Shelter index on rental equivalence basis, with estimated adjustment for vacant units . . . . .	10.0	9.5	6.5	5.3	6.0	6.0	5.1

<sup>1</sup> Seasonally adjusted annual rate of change.

rising 15.1 percent during 1980, the CPI for shelter rose a mere 2.4 percent in 1982. During this period, the shelter index was a major factor in the slowdown of the overall CPI. But since 1982 the shelter index has seemingly moved contrary to other prices—more than doubling its rate of increase, while other portions of the CPI continued to slow. (See table 2.)

One can understand this unusual performance only through a careful review of two technical changes that have been made to the CPI shelter index. The first was the shift to an owners' equivalent rent measure for homeowner shelter costs effective with the CPI-U for January 1983.<sup>2</sup> The second was an improved method for treating vacant housing units, beginning with data for January 1985.<sup>3</sup>

The introduction of these two improvements affected both the shelter component and the All Items CPI. Consequently, it is advantageous for purposes of analyzing the trends in shelter costs to estimate these effects and adjust for them. The first line of data in table 2 contains annual inflation rates for the official CPI for shelter. It exhibits the unusual behavior noted above.

BLS has previously constructed and published enhanced experimental indexes which provide estimates of what the CPI would have been in years prior to 1983 if the owners' equivalent rent measure had been used.<sup>4</sup> The shelter component based on these rental equivalence estimates is contained in the second line of table 2. The owners' equivalent rent method produces indexes which reflect the change in shelter costs for homeowners. The previous method had included investment costs associated with purchasing a housing asset—costs that were inappropriate for the CPI. The differences between these two measures illustrate the problem. (See table 2.) The skyrocketing mortgage interest rates in early 1980 caused the official shelter index to rise 15.1 percent, two-thirds again as much as the actual shelter service cost rise measured using the more appropriate owners' equivalent rent measure. Similarly, when mortgage interest rates dropped sharply in 1982, the official shelter index rose less than half as much as the measure based on owners' equivalent rent.

The effects of the improved methods for treating vacant housing units in the CPI are a good deal less dramatic than

those from the introduction of owners' equivalent rent. The final line of table 2 provides an analytical reconstruction of the shelter index as it would have looked had both owners' equivalent rent and the enhanced vacant unit procedure been used.

By adjusting the shelter index for the two methodological changes, it becomes easier to identify and explain the trends of shelter costs in the last few years. Like the CPI as a whole, shelter cost increases (on the reconstructed basis) began slowing in 1981. They continued to slow through 1983, then moved up slightly to a 6.0-percent annual rate in both 1984 and 1985. The first half of 1986 gives some indication of a further slowdown. Although the rise in shelter costs has clearly slowed, both the degree and speed of that adjustment have been considerably less than in the overall CPI. There are a number of institutional factors that contribute to the relatively slower adjustment of shelter costs—the almost universal use of leases that hold rent constant for extended periods, rent control in some local areas, and existing stable tenant-landlord relationships that make both reluctant to change terms too rapidly. In addition, the available stock of housing cannot adjust as quickly to changing demand conditions as can the supplies of most other consumer items.<sup>5</sup>

These institutional expectations are borne out historically. A long historical series is not available for the shelter CPI based on owners' equivalent rent, but the use of the residen-

**Table 3. Dates and timing of peak and trough rate for 12-month percent changes of consumer prices, 1947-80**

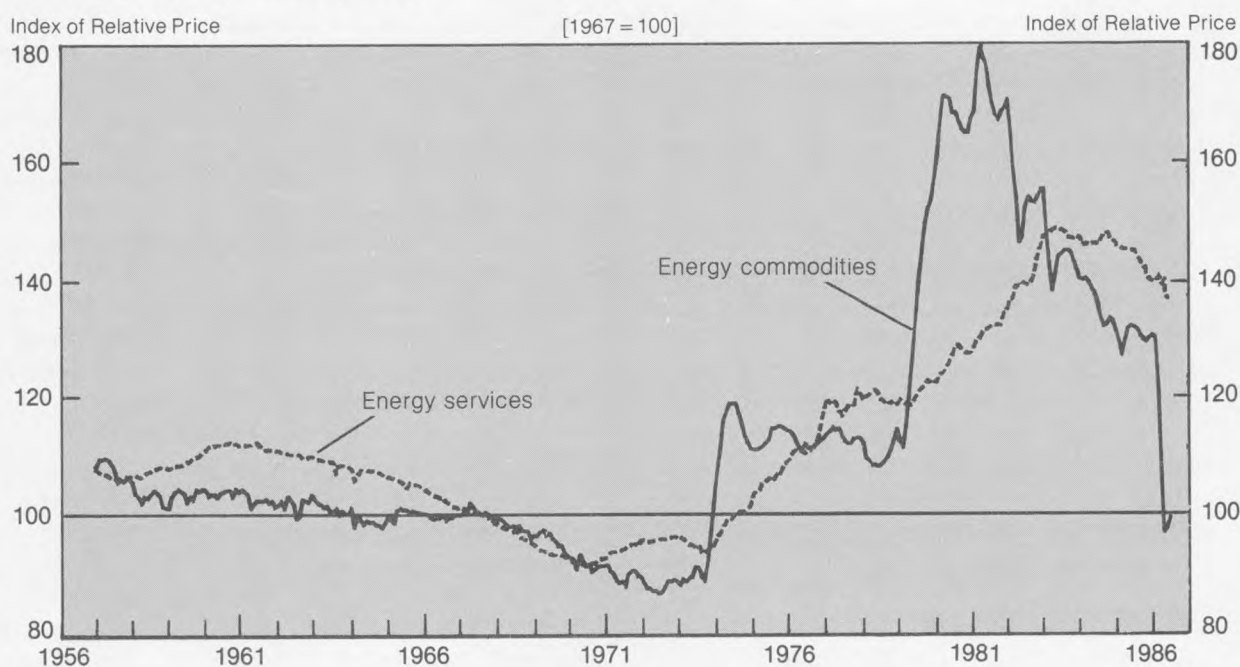
All items		Residential rent		Months by which rent lags (leads) all items <sup>1</sup>	
Peak	Trough	Peak	Trough	Peak	Trough
March 1947	August 1949	June 1948	January 1951	15	17
February 1951	October 1954	October 1953	September 1955	30	11
April 1957	April 1959	December 1956	September 1964	-4	65
February 1970	June 1972	April 1971	June 1972	14	0
December 1974	December 1976	(2)	(2)	-	-
March 1980	—	July 1980	—	4	-

<sup>1</sup> Positive numbers are lags—number of months after all items change. Negative numbers are leads—numbers of months before all items.

<sup>2</sup> Skipped cycle. Rate did not slow for any significant period of time.

tial rent CPI provides a reasonable proxy for the timing of changes in shelter costs in earlier years.<sup>6</sup> If we compare the points in time at which the residential rent CPI has reached its highest (peak) values and lowest (trough) values with the corresponding times for the All Items CPI, it is clear that the rate of rent increase almost always slows or accelerates well after the corresponding change occurs in the All Items CPI. (See table 3.) If the current episode of slowing inflation is consistent with earlier ones, one should not be too surprised if there were some additional modest slowing in shelter costs.<sup>7</sup>

**Chart 4. Index of relative consumer prices of energy commodities and energy services, seasonally adjusted, 1957-1986**



## The trend in food prices

For the 6 months ended in June, the food index advanced at an annual rate of 1 percent with an increase in the cost of food away from home—up 4.1 percent at an annual rate—more than offsetting a decline in grocery store food prices—down 0.5 percent at an annual rate. Decreases in prices for beef and fruits and vegetables were responsible for the drop in the food-at-home component. Beef prices fell at an annual rate of 12.1 percent in the first 6 months. The drop in herd size, which has shrunk to its lowest levels in two decades, has not yet placed significant upward pressure on prices. Potential supplies were augmented when the U.S. Department of Agriculture (USDA) announced a large dairy cow buy-out program in late March. Nevertheless, in June, beef prices registered their first increase this year. Pork prices have already started upwards, as hog producers have begun to withhold breeding stock to rebuild their herds. As of June, the USDA estimated that pork cold storage supplies were 36 percent below their year-earlier levels. Poultry prices also advanced in the second quarter, partly due to increased demand and partly due to the impact on supplies of the adverse weather in the southeastern United States.

The decline in fruit and vegetable prices in the first half of 1986, however, is likely to continue. These prices, which rose sharply in response to adverse weather at the end of 1985, retreated and growing conditions generally were good in the first half of 1986. The severe drought in the Southeast should have only a limited effect on these prices because production is concentrated in other areas, which were not adversely affected by the weather conditions.

Other grocery store foods registered generally moderate increases during the first 6 months of the year. An exception was the index for nonalcoholic beverages, which advanced at double-digit rates, as coffee prices soared in the first quarter of 1986, before turning downward in the second quarter. This increase reflected the impact of the Brazilian drought in late 1985, which damaged the coffee bean crop.

## Services except shelter and energy

As noted, price increases for services other than energy and shelter have, on average, slowed down significantly since 1981, but they remain substantially greater than the increases for nonenergy commodities.<sup>8</sup> This section will explore the structure and possible causes of the more limited deceleration response of service prices. In an effort to systematize this investigation, all consumer services besides shelter and energy have been classified into one of four groups: (1) those which have contributed to the overall slowing of prices and generally continue to demonstrate only modest price rises; (2) those for which prices have clearly slowed, but continue to rise a good deal faster than other prices; (3) those which provide continuing or growing upward pressure on inflation; and (4) those that defy classification even by these rather general categories. The results of this classification are displayed in table 4.

Price changes for a large number of services have slowed substantially since 1981. Perhaps most dramatic has been the sharp drop in finance charges for automobiles as interest rates generally have declined and automobile manufacturers have made extensive use of "below market rate" financing to stimulate car sales. Increases in airline fares have also fallen off markedly as declining fuel costs and fierce competition from both existing and newly formed airlines have driven fares down to very low levels on many of the more competitive routes. Another transportation service, namely taxis, has also had much slower fare growth, in part due to lower fuel costs and in part due to increased competition from improved availability of mass transit in some areas.

The AT&T divestiture, combined with competition from new long distance telephone carriers, has led to a number of substantial reductions in interstate long distance tolls. Although postage rates rose 10.2 percent in 1985, that was the only increase in more than 3 years, with the result that postage also contributed to the overall price slowdown.

The remaining services which have shown clear reductions in their inflation rates to levels of about 4 percent or less include appliance and furniture repair, apparel services, automobile maintenance and repair, personal care services (beauty and barber shops), and moving, storage, freight, household laundry, and drycleaning. (The 1985 increase in moving costs may be related in part to the strengthening of the housing market and the associated demand for moving services.) These service establishments have benefited from moderation or declines in heating, transportation fuel, and supply costs. They also have a high proportion of relatively small establishments and fair amounts of local competition. Auto repair services may also be facing reduced demand because of the longer intervals between required maintenances on newer models.

## Medical charges continue substantial rises

Other services have also experienced slowing price rises, but they continue to post substantial or even reaccelerating price increases. Medical care services are perhaps the most notable in that respect. Costs of professional medical services (physicians, dentists, optometrists, and so on) rose at double-digit rates during most of the 1979–81 period and slowed during 1982 and 1983 to annual rates of increase of between 7 and 8 percent. Beginning with 1984, charges for professional medical services have risen at a fairly constant rate of a bit over 6 percent. In addition to general reductions in inflation pressures on cost, factors which may have contributed to the slowing of professional medical service charges include (1) a voluntary 1-year freeze on physician fees urged by the American Medical Association (AMA) in February 1984; (2) declines in prices for precious metals used in dental fillings; (3) increased competition from advertising among dentists; and (4) modest increases in wages and benefits for employees in health industries—up 4.1 percent for the 12 months ended June 1986, about the same as for all civilian workers.<sup>9</sup>

Despite these factors, however, charges for services by medical professionals have stubbornly grown at annual rates in excess of 6 percent. One factor which may have contributed to this continued inflation is the widely publicized substantial increases in malpractice insurance premiums. These increases have tapered off, but continue to be quite high. After jumping more than 40 percent in 1982, average premium increases by 1984 were down to a smaller but still substantial 18.3 percent.<sup>10</sup> It is also possible that the measured CPI increases reflect more than pure price change. New diagnostic and treatment methods, procedures, and equipment may increase the costs of professional services. At the same time, however, they may improve the efficiency and efficacy of a diagnosis or treatment. To the extent that the higher charges are the result of better medical care, the increases are not pure price increases and should, in principle, not be included in the CPI. We do not know whether such quality increases are in fact contributing to the continued substantial rises in the medical care CPI, but it is a possibility that must be kept in mind.

Charges for hospital rooms and for other hospital and medical care services both rose at very high double-digit rates through 1982. Like many large service organizations, hospitals tend to be slow to adjust their fee schedules to reflect changes in their costs. As a result, slower price increases for hospitals came later than for many other segments of the economy—including those by medical professionals. Nevertheless, from 1983 through 1985, hospital

fees slowed down quite significantly. Like the professional services component of the CPI, hospital costs have benefited from modest rises in compensation costs for employees. In addition, hospitals have come under increasing regulatory scrutiny by Federal, State and local government units in an effort to contain cost increases. In October 1983, the Federal Government imposed a Diagnostic Related Groups (DRG) fee structure on hospitals being reimbursed for Medicare-financed treatment. Under this process, a set fee is established for a specific class of treatment irrespective of the duration or specific procedures followed in a particular case. The objective is to encourage providers to identify and use the most cost-effective treatment. Some insurance carriers and health maintenance organizations (HMO's) are also establishing similar payment regimens.

Some of the slowing in hospital charges may reflect market adjustments to oversupply of hospital capacity. Between 1978 and 1984, occupancy rates in hospitals declined from 75.5 percent to 72.5,<sup>11</sup> at least partly as the result of shorter hospital stays. The average length of a hospital stay declined from 7.4 days in 1978 to 6.6 days in 1984.<sup>12</sup>

Following their substantial slowdown through 1985, hospital fees began to accelerate again during the first half of 1986. This rather abrupt turnaround is difficult to explain. The possible effects of liability insurance and higher quality care are, of course, factors for hospitals as well as professional services, but there is no obvious reason these effects should have become more pronounced in the first 6 months of 1986.

Table 4. Price change for consumer services other than shelter and energy, 1979–86

Consumer service	Seasonally adjusted annual rate of change (percent)					
	Dec. 1978 to Sept. 1981	Sept. 1981 to Dec. 1982	Dec. 1982 to Dec. 1983	Dec. 1983 to Dec. 1984	Dec. 1984 to Dec. 1985	Dec. 1985 to June 1986
Services excluding shelter and energy .....	10.1	7.8	4.9	6.0	5.4	6.3
Contributing to overall slowdown:						
Telephone—interstate toll calls .....	5.5	3.3	1.4	-4.3	-3.8	-11.0
Moving, storage, freight, household laundry, and drycleaning .....	10.9	7.6	6.2	4.9	7.2	3.1
Appliance and furniture repair .....	7.5	6.9	4.9	5.6	3.1	3.1
Postage .....	6.8	7.6	0	0	10.2	0
Apparel services .....	11.8	6.3	5.0	4.9	4.9	4.1
Automobile maintenance and repair .....	10.0	6.5	3.8	3.2	3.3	2.6
Automobile finance charges .....	19.4	-1.9	-7.9	6.8	-8.3	-13.1
Airline fares .....	28.0	7.7	4.8	6.5	6.3	1.6
Taxi fares .....	12.7	3.4	2.3	1.2	4.3	2.2
Personal care services .....	8.4	5.4	3.6	4.9	3.6	3.5
Contributing to slowdown, but remaining high:						
Water and sewage maintenance .....	8.8	8.3	8.5	5.5	5.5	7.2
Intercity train fares .....	18.2	12.0	5.5	4.7	4.8	7.5
Intracity mass transit .....	18.9	5.1	2.1	6.8	3.4	12.5
Professional medical services .....	10.5	7.3	7.6	6.3	6.5	6.1
Hospital rooms .....	13.5	14.6	9.3	7.4	4.8	8.3
Other hospital medical care services .....	13.1	12.0	11.2	7.8	5.2	7.0
Entertainment services .....	7.2	7.0	5.4	5.7	4.4	6.2
Tuition and other school fees .....	11.2	12.0	9.4	10.1	8.4	9.1
Personal expenses (bank charges, attorney fees, and funerals) .....	12.5	13.3	12.2	6.5	6.1	8.4
Contributing upward pressure:						
Telephone local charges .....	6.4	11.3	3.2	17.1	8.9	16.7
Refuse collection .....	-	-	-	6.1	6.4	7.8
Automobile insurance .....	6.2	8.1	9.1	7.9	12.0	13.6
Intercity bus fares .....	14.3	5.9	7.4	12.3	6.9	14.9
Little meaningful trend:						
Telephone—intrastate toll calls .....	0.9	5.8	7.4	3.7	.5	.5
Cable television .....	-	-	-	6.1	6.0	5.4
Automobile rental, registration, and other fees .....	5.3	12.6	5.9	7.4	3.0	6.2

Many cost containment efforts have been focused on reducing the length of hospital stays and shifting more treatment to an outpatient basis (up from 6.9 percent of hospital revenue in 1978 to 8.8 percent in 1985).<sup>13</sup> While these measures may have the effect of reducing the expenditure for a full treatment, they may actually place an upward pressure on the prices of separate services. On the one hand, higher vacant bed rates do increase the supply of hospital beds and, thereby, may exert some downward pressure on prices. On the other hand, the rather substantial fixed costs for a hospital must now be spread over fewer occupied beds. The final equilibrium price will depend, among other things, on the proportion that fixed costs are of total costs and on the consumer's price elasticity of demand.

The establishment of DRG pricing is intended to lower the total cost for those whose bills are paid by the third-party setting the DRG fee schedule. It is possible, therefore, that over time hospitals may restructure their prices in such a way that larger portions of the fixed costs are borne by those who are not covered by a DRG arrangement. Prices used in the CPI are not generally subject to such arrangements.

It may have taken several months for hospitals to sort out these consequences. As a result, hospital price indexes in the first half of 1986 may be reflecting restructuring of fee schedules to shift costs away from more highly regulated or competitive areas to those with less impact from regulation or competition. While plausible, this explanation is highly conjectural and is offered here primarily due to the lack of an obvious alternative explanation.

### **Tuition also continues high**

Tuition and other school fees have also been slow to respond to the overall decline in inflation. Much of this is an institutional phenomenon. Tuition is usually set well in advance—often as much as 2 years. As a result, both accelerations and decelerations in tuition lag well behind many other price changes. Contributing to the substantial increases in the 1981–1984 period were steps by a number of State legislatures either to reduce funding for State higher education and/or to set higher levels of required student payment.

Intercity train fares have also been boosted as the result of reduced government funding. The Federal subsidy for Amtrak was cut by 4 percent in 85 and by 14 percent in 1986. Nevertheless, reduced fuel costs and competition from the airlines kept fare increases well below their 1979–82 rates.

Water and sewerage maintenance and intracity mass transit have both slowed down from their peak levels. Nevertheless, both continue to have relatively high rates of inflation, despite mass transit charges having benefited from lower energy costs. Because transit and water and sewer services are frequently owned and operated by local government units, the higher-than-average inflation for these services may reflect, in part, the higher-than-average compensation increases for State and local government employees—up

5.8 percent for the year ended June 1986, versus 3.8 percent for private industry workers in the same period.<sup>14</sup> Continued large price increases for refuse collection may reflect not only compensation increases, but also rising “tipping charges” being levied by local government units for use of dump sites and other disposal locations.

Continuing inflationary effects also arise from the charges for local telephone services. The first effects were the direct result of restructuring of AT&T in 1984. Then additional “access charges” were added to local bills in June 1985 and June 1986 as part of the procedure for equalizing both the cost and ease of access among competing long distance carriers and for allocating costs for different elements of the telephone system to the users of those elements. Coincident with the added access charges were partially offsetting declines in interstate long distance charges. Intrastate telephone service is a mixture of (1) toll service supplied by the local operating companies and (2) service provided by long distance carriers. As a result, the index for intrastate toll calls is a mixture of the two factors with no distinct trend of its own.

### **Auto insurance up sharply**

Automobile insurance rates rose at an annual rate of 13.6 percent during the first half of 1986. Not only is this one of the highest inflation rates for items in the CPI, it is more than double the rate which existed in the 1979–81 period. The largest increases have been for the liability portions of auto insurance. A number of reasons have been offered for this. First, accidents are becoming more frequent—up nearly 5 percent between 1984 and 1985, possibly as the result of reduced adherence to the 55-mile-per-hour speed limit.<sup>15</sup> Second, the proportion of accident survivors who are severely injured has been increasing—ironically partly due to increased survival rates resulting from greater use of seatbelts, now mandatory in some States.<sup>16</sup> Third, as in medical care, there seems to be a significant increase in the frequency and magnitude of liability suits.<sup>17</sup> This fact not only increases direct insurance benefit outlays, it also increases uncertainty and carrier reserve levels. Fourth, declining interest rates have reduced insurance carriers' returns on their investments. While reduced interest income requires that additional income must be generated from premiums, the effect for automobile insurance is probably less than for some other types of insurance.

But automobile insurers are also benefiting from some significant reductions in cost pressures. The prices for automobile repair have slowed substantially. And, even though medical costs continue to rise more than many items, they are rising much more slowly than 6 years ago and much more slowly than the automobile insurance costs.

Intercity bus fares also rose at double-digit rates during the first half of 1986—up 14.9 percent. This large increase occurred despite the much more modest rises for the chief competing services—airlines and trains. This apparent

anomaly can be understood, at least in part, by realizing that the competition is only partial. First, buses go many places that airlines and trains do not. Bus fares on these, usually shorter-haul, trips are not as constrained by competition. Second, airfares have not moved homogeneously. They have risen most slowly (or even fallen) on the routes with the heaviest competition and traffic. Other routes have had larger fare increases and given buses less competition.

### Other commodities

Even excluding the sharp drop in energy prices and lower used car prices, prices for commodities have risen at a much slower rate than those for nonenergy services. This divergence in commodity and service prices suggests that commodity prices in this country may have been affected by lower priced imports resulting from the high value of the dollar relative to the currencies of other countries.

When the dollar was appreciating from 1981 to March 1985, foreign suppliers of imports could receive the same income in their own currency by selling the same quantity of imports at lower dollar prices, as each dollar received by them commanded a greater amount of their own currency. However, it may have taken some time for the rising value of the dollar to have translated into relatively lower costs of imports; a recent Federal Reserve Bulletin article estimated that such an impact may take up to 2 years to appear.<sup>18</sup> The impact of the changing value of the dollar on import prices can be delayed or reduced substantially as a result of changing profit margins of suppliers, the necessity to revise dollar denominated contracts, and specific trade restrictions such as import quotas. Also, changes in the rates of exchange between the dollar and the currencies of the Nation's various trading partners have not been uniform. While the dollar has depreciated significantly against the yen and a number of major European currencies, there has been little change against the currencies of many less developed countries which are significant trading partners. Another point to con-

sider is that the relative price level of imports may be strongly affected by the growth rate of the domestic economy. Although U.S. economic growth has been quite modest, it still exceeds that of many of the country's principal trading partners. Thus, a large number of factors may have intervened to minimize the price-reducing effect of the 1981-85 dollar appreciation, and these same factors may vitiate or delay any inflationary impact of the post-March 1985 devaluation.

From June 1982 through March 1985, as the dollar was appreciating, prices paid by importers for consumer commodities (other than energy, food, and used cars) rose at an annual rate of only 0.7 percent, while prices paid by consumers for the same set of commodities (as measured by the CPI) rose at an annual rate of 3.0 percent.

In the 15 months following the March 1985 peak value of the dollar, these import prices accelerated sharply, rising at an annual rate of 7.9 percent, while the corresponding consumer prices actually slowed more and rose only 2.2 percent. At least for the first 15 months of the dollar's decline, therefore, there was no obvious aggregate effect on consumer prices. Prices paid by importers did not show any obvious impact of the dollar devaluation until the third quarter after it began. After two more quarters, prices paid by consumers still showed no major effects.

Comprehensive analysis relating changes in import prices to changes in consumer prices is difficult. However, some data on price changes have been compiled for nonfood, nonenergy components of the CPI which are judged to have an above average representation of imports in market sales. For each of the 16 commodity groups presented in table 5, import sales constituted more than 10 percent of 1984 total sales.

Table 5 presents annualized rates of change in the commodity price indexes for five periods; price changes shown for the first and last periods were periods of depreciation of the dollar in foreign exchange markets and the others, peri-

**Table 5. Seasonally adjusted annual rates of change for Consumer Price Indexes for selected commodities with higher than average import proportions, December 1978 to June 1986**

Item	Dec. 1978 to Sept. 1981	Sept. 1981 to Dec. 1982	Dec. 1982 to Dec. 1983	Dec. 1983 to Mar. 1985	Mar. 1985 to June 1986
Commodities less food and energy .....	8.7	5.1	5.0	3.5	0.7
Wine at home .....	8.4	2.0	-1.5	.7	2.6
Whiskey at home .....	5.9	2.6	1.5	1.3	7.8
Alcoholic spirits excluding whiskey .....	4.6	1.8	1.0	2.0	9.7
TV and sound equipment .....	1.9	-1.1	-2.2	-4.1	-5.1
Clocks, lamps, and decor items .....	8.3	1.7	2.4	1.0	1.6
Tableware, serving pieces, and nonelectric kitchenware .....	9.8	2.7	1.6	.5	2.2
Lawn equipment, power tools, other hardware .....	6.3	6.1	2.3	1.9	-1.9
Men's and boys' apparel .....	4.7	2.9	2.3	2.3	1.3
Women's and girls' apparel .....	2.0	.1	3.3	2.5	-2.3
Infants and toddlers' apparel .....	7.3	2.0	3.5	5.5	4.6
Jewelry and luggage .....	11.9	-2.2	3.4	.3	-1.1
Footwear .....	6.7	1.4	1.0	2.0	-1.4
New vehicles .....	7.2	2.6	3.3	3.0	4.1
Sporting goods and equipment .....	7.6	2.7	2.6	2.5	.4
Toys, hobbies, and other entertainment commodities .....	8.2	4.0	1.5	1.3	2.5
Other toilet goods and small personal care appliances .....	9.3	5.3	5.2	3.6	2.9

ods of dollar appreciation. On the one hand, as the dollar strengthened from 1981 to early 1985, one would expect, all other things being equal, that commodities with substantial proportions of imports would exhibit a reduction in prices relative to those of other commodities. That is, while inflation for nonfood, nonenergy commodities on average dropped from 5.1 percent in the early part of the period to 3.5 percent in the latter, one might expect that the price change for commodities with significant import concentrations would slow even more. In fact, only four of these commodity indexes (TV and sound equipment; tableware, serving pieces, and nonelectric kitchenware; lawn equipment, power tools, and other hardware; and toys, hobbies, and other entertainment commodities) showed such a greater reduction.

On the other hand, as the dollar weakened, one would expect that prices for import-affected items would accelerate relative to other prices. Prices for some items have accelerated as one might expect, although quite modestly—for example, tableware, serving pieces, and nonelectric kitchenware; toys, hobbies, and other entertainment commodities; wine at home; and new vehicles. But whiskey and other distilled spirit prices accelerated strictly as the result of the imposition of an additional Federal excise tax on distilled spirits in October 1985 and prices for many other items actually slowed or declined more.

The case of new vehicles is an interesting one and illustrates the fact that not only the foreign producer, but also the domestic distributor, may expand profit rates during periods of rising dollar value. During the past few years, it became increasingly common for imported car dealers to add sometimes substantial surcharges because of the limited supply available to them. As the import prices of new cars have begun to rise sharply, there is evidence that dealers are cutting back on their surcharges so that the final prices to the consumer are rising more slowly. While the price paid by

the importer rose 14.7 percent in the 9 months ended June 1986, the prices paid by consumers for all cars rose only 3.8 percent. Most of this CPI increase has, however, occurred in the last 3 months.

There is some evidence that a strong dollar may have helped lower inflation and that subsequent dollar weakness may be causing some upward price pressure. Nevertheless, the analysis summarized in table 5 indicates that general exchange rate movements may not serve as a reliable guide in predicting changes in consumer costs for specific products having high import representation, as other factors influencing price change in particular markets may predominate.

## Conclusion

The absence of any overall inflation for consumers during the first half of 1986 derived primarily from the sharp decline in petroleum prices. Nevertheless, price moderation was very widespread. On average, cost pressures from materials and labor remained very subdued, and consumer prices for most commodities and many services rose only slightly or declined. The rates of price increase for shelter costs were greater than for overall consumption, but they have been slowing and, based on experience, one would expect that continued moderation in overall inflation will slowly continue to bring them down. The remaining pockets of persistent inflation seem to derive from particular structural factors that may not be very responsive to additional market forces. Among these factors are: reductions in Government subsidies and services, possible cost shifting from regulated activities of an establishment to the unregulated, putative increases in liability litigation, above average increases in compensation for State and local government employees, the court-ordered restructuring of AT&T, and higher rates of nonfatal personal injury in automobile accidents. □

### —FOOTNOTES—

<sup>1</sup> See, for example, *Blue Chip Economic Indicators*, Aug. 10, 1986, a consensus of 52 economists, who, on average, estimate an increase of 1.9 percent in the CPI for 1986.

<sup>2</sup> See Robert Gillingham and Walter Lane, "Changing the treatment of shelter costs for homeowners in the CPI," *Monthly Labor Review*, June 1982, pp. 9–14. See also "Changing the Homeownership Component of the Consumer Price Index to Rental Equivalence," *The CPI Detailed Report*, January 1983, pp. 7–13.

<sup>3</sup> Joseph D. Rivers and John P. Sommers, "Vacancy Imputation Methodology for Rents in the CPI," *Proceedings of the Business and Economics Section of the American Statistical Association*, 1983, pp. 201–05.

<sup>4</sup> "The effect of rental equivalence on the consumer price index, 1967–82," *Monthly Labor Review*, February 1985, pp. 53–55.

<sup>5</sup> There is also limited anecdotal evidence that in some rental markets landlords may be offering special incentives other than lower rents to attract new tenants. Such incentives as reduced security deposits and free merchandise would not be reflected in the CPI rent index.

<sup>6</sup> Residential rent and owners' equivalent rent constitute nearly 92 percent of the shelter CPI. (Other components are maintenance and repair,

tenants' and household insurance, lodging while out of town, and college housing.) In addition, while residential rent has usually risen somewhat faster than owners' equivalent rent since 1983, the two series have been quite close.

<sup>7</sup> As in any such analysis, unpredictable external factors can occur. One such potential factor in the coming months is the impending new income tax legislation which some analysts believe may cause upward pressure on residential rent if tax treatment of real estate investment is changed.

<sup>8</sup> The acceleration in these service prices from 1983 to 1984 might suggest the hypothesis that at that point in time there were the early stirrings of renewed economywide inflation. However, it was a very narrow phenomenon; almost the entire acceleration between those 2 years can be attributed to a temporary rise in automobile finance charges and to sharply higher local telephone charges arising from the divestiture of AT&T.

<sup>9</sup> Employment Cost Index (ECI) for compensation, Bureau of Labor Statistics.

<sup>10</sup> American Medical Association, *Socioeconomic Characteristics of Medical Practice*, 1985.

<sup>11</sup> American Hospital Association, *Hospital Statistics*, 1984.

<sup>12</sup> *Vital and Health Care Statistics* (National Center for Health Statistics, various years).

<sup>13</sup> *Social Security Bulletin*, Health Care Financing Administration, various years.

<sup>14</sup> Employment Cost Index.

<sup>15</sup> Insurance Information Institute.

<sup>16</sup> *Ibid.*

<sup>17</sup> *Ibid.*

<sup>18</sup> Catherine L. Mann, "Prices, Profit Margins, and Exchange Rates," *Federal Reserve Bulletin*, July 1986.

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### A rope of sand

My job as the president of the A. F. of L. was coveted by no one in the early days. There was much work, little pay, and very little honor. Though the Federation had been created by agreement, it had to be given reality by making it a force in industrial affairs. The necessary first step was to win for the Federation the good will of the wage-earners. The Federation was the unified activity of the trade union men. It was dependent upon good will and understanding of economic power. So I became a seeker of men. I wanted to win them for a labor movement which was sound philosophically, competent economically, and inspiring spiritually. At times I was well-nigh consumed with zeal, so that I gave little thought to anything else. My work was my life. So in recording the events of my life the labor movement is the controlling purpose.

I watched our local unions and gave them suggestions and advice. I fostered the organization of city centrals and State federations. I sent reminders to national officers urging them to pay per capita dues. In the case of national bodies which the Federation had fostered, local unions and members expected me to be a sort of fatherly supervisor of the organization. I wrote letters and talked to officials, diplomatically urging them to performance of duties and constructive policies. I got trade unions to put on their letterheads "affiliated to the American Federation of Labor" and thus helped advertise the name. All this work had to be done in such a way as to win men to the cause. The Federation had no compulsory authority—it was absolutely dependent upon voluntary cooperation.

—Samuel Gompers,  
*Seventy Years of Life and Labor:*  
*An Autobiography*, Nick Salvatore, ed.  
(Ithaca, NY, ILR Press, 1984), p. 103.

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# Spending patterns of older persons revealed in expenditure survey

*New estimates point up differences in characteristics, incomes, and expenditures of younger and older populations within the larger group of persons age 65 and over*

BETH HARRISON

Interest in the characteristics of older persons is flourishing due to the increasing size of the population age 65 and over. According to projections by the U.S. Bureau of the Census, presented in table 1, every fifth American will be over 65 by the year 2040. This reflects the aging of the postwar baby boom and declining birth rates during the later decades of this century. Clearly, older persons will constitute a rapidly growing political, social, and economic force for many years to come.

Within this environment, new estimates from the Bureau of Labor Statistics Consumer Expenditure Survey (CE) program are likely to be an important tool for trend assessment and policy formation. To date, "65 and older" has been the oldest age class for which expenditure data have been pub-

lished. (For study purposes, consumer units are assigned to the age category of the householder, or "reference person," as reported on the survey questionnaire.<sup>1</sup>) In recently released estimates, however, that class has been divided into two groups, ages 65-74 and 75 and over. The results reveal that, although persons 65 and over are often viewed as a homogeneous group, the characteristics, incomes, and needs of the younger and older populations within the larger group are actually quite different.

*Expenditure differences.* Tables 2 and 3 summarize the differences in the 1984 characteristics and spending patterns of the two major subgroups of older Americans.<sup>2</sup> Consumer units in the 65-74 age group spent almost 22 percent more on housing than those in the 75-and-over group. However, housing accounted for a higher *share* of the older group's total expenditures. The expenditure share for fuels, utilities,

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**Table 1. Distribution of the older population by age subgroup, actual and projected, selected years, 1970-2040**

Year	Total, 65 and over		65-74		75 and over	
	Number	Percent of total population	Number	Percent of total population	Number	Percent of total population
1970	20,087	9.9	12,487	6.2	7,600	3.7
1980	25,708	11.3	15,647	6.9	10,061	4.4
2000	35,036	13.1	17,693	6.6	17,343	6.5
2020	51,386	17.3	25,968	10.0	25,418	7.3
2040	66,642	21.6	20,228	9.4	46,414	12.2

SOURCE: *Demographic and Socioeconomic Aspects of Aging in the United States*, series P-23, No. 138 (Bureau of the Census, 1984), ch. 2, pp. 5-18, middle series.

and public services was also higher for the 75-and-over group, even though the amount spent was less than that for those age 65-74. The average expenditure on owned dwellings was more than one-third higher for those 65-74 than for the older class. This can be attributed to higher levels of homeownership and a higher percentage of consumer units still paying on their mortgages in the younger group. About 76 percent of those age 65-74 owned their homes compared to 67 percent of the older group. On the other hand, only 8 percent of the homeowners in the older group still owed on mortgages compared to 33 percent of their younger counterparts. There were also large differences in property taxes, for which the expenditures of those 65-74 were 33 percent more than those of the 75-and-over group. This reflects the higher rate of homeownership for the younger group and also suggests they owned more expensive houses or lived in areas with higher property taxes, or both.

Expenditures for transportation accounted for 19 percent of the total expenditures of those age 65-74, compared with 13 percent of the total for those 75 and over. The average expenditures of the former age group were more than twice as high as those of the latter. Much of the difference can be attributed to the higher level of vehicle ownership, 81 percent by those aged 65-74, compared to 59 percent by older persons. It is also likely that vehicles are used less frequently by the older group, further reducing their transportation expenditures.

The data for health care confirms the expectation that both mean expenditures for health care and the health care share of total expenditures are higher for the 75-and-over age group than for their younger counterparts. Health care accounted for 13 percent of the total expenditures of those 75 and over compared with 8 percent of the total for those 65-74.

*Income differences.* Because income is one of the important determinants of spending, differences in income may help to explain the differences in expenditure patterns. The following tabulation compares selected income components for the age groups.

Sources of income	Age 65-74	Age 75 and over
Income before taxes	\$16,815	\$12,442
Sources of income (percent)	100.0	100.0
Wage and salaries	29.3	9.3
Self-employment income	4.6	6.5
Social Security, railroad, and government retirement	52.7	62.9
Interest and dividends	9.6	17.6
Other income	3.8	3.7

The mean income before taxes of the 65-74 age group was more than one-third higher than for persons 75 and over. The largest components of income for both groups were retirement income (consisting of Social Security, private, and government retirement), which accounted for 53 percent of the income of the 65-74 group, compared with 63 percent for the 75-and-over group. Wages and salaries made up about 30 percent of the income of the younger group, which indicates that the reference person or other household member was still working, while it dropped to 10 percent of income for those 75 and over. This is consistent with the fact that the average number of earners is three times higher for the younger group.

The age groups in table 3 differ from those published in regular CE releases. The working age groups, those 25-54, are combined. Older age groups are subdivided into those approaching retirement, those 55-59 and 60-64, and into the two groups that are the focus of this article, those 65-74 and 75 and over.

Since 1980, the Consumer Expenditure Survey has been conducted on a continuing basis. As a result, trends for age and other demographic groups can be more effectively monitored over time. This article is but one of a series highlight-

**Table 2. Selected characteristics and expenditure shares for urban consumer units in the age groups 65-74 and 75 and over, Interview Survey, 1984**

Item	Age group	
	65-74	75 and over
Total expenditures	\$15,873	\$11,196
Consumer unit characteristics:		
Average number of earners	.6	.2
Average number of vehicles	1.4	.8
Percent homeowners:		
With mortgage	20	5
Without mortgage	56	62
Percent renters	24	33
Shares of total expenditures (percent):		
Total	100.0	100.0
Food at home	13.0	13.6
Food away from home	4.8	3.5
Housing	30.5	35.5
Transportation	19.2	13.0
Health care	8.4	13.3
Entertainment and reading	4.6	3.4
Personal insurance and pensions	4.9	2.1
Apparel	4.5	3.1
Other	10.1	12.5

**Table 3. Selected characteristics and annual expenditures of urban consumer units classified by age of reference person, Interview Survey, 1984**

Item	All consumer units	Under 25	25-54	55-59	60-64	65-74	75 and over
Total consumer units (in thousands)	74,884	7,266	42,688	5,418	5,592	8,312	5,608
Number of sample interviews	23,043	2,456	13,005	1,631	1,666	2,551	1,734
<b>Consumer unit characteristics:</b>							
Income before taxes <sup>1</sup>	\$24,578	\$12,579	\$29,114	\$30,670	\$23,477	\$16,815	\$12,442
Average number of persons	2.6	1.8	3.1	2.7	2.3	1.9	1.5
Average age of reference person	46.2	21.5	38.0	56.9	62.0	69.3	80.6
Average number in consumer unit:							
Earners	1.4	1.3	1.7	1.8	1.2	.6	.2
Vehicles	1.9	1.1	2.1	2.3	2.0	1.4	.8
Children under 18	.7	.3	1.1	.4	.2	.1	.0
Persons 65 and over	.3	.0	.0	.1	.1	1.4	1.4
Percent homeowners	60	10	60	79	79	76	67
<b>Average annual expenditures</b>							
Food	\$21,788	\$13,178	\$25,484	\$25,369	\$20,705	\$15,873	\$11,196
Alcoholic beverages	3,391	2,030	3,834	4,092	3,413	2,831	1,912
Housing	299	364	347	320	225	179	90
Shelter	6,626	3,740	7,857	7,044	5,877	4,848	3,972
Owned dwellings	3,747	2,386	4,559	3,751	3,066	2,386	2,014
Rented dwellings	2,188	465	2,791	2,442	1,961	1,378	1,009
Other lodging	1,171	1,724	1,340	751	662	632	884
Utilities, fuels, and public services	388	197	428	558	443	377	122
Household operations	1,679	722	1,827	2,058	1,837	1,644	1,311
Housefurnishings and equipment	333	118	398	288	238	269	356
Housefurnishings and equipment	868	513	1,073	947	737	549	291
Apparel and services	1,192	787	1,457	1,459	995	715	346
Transportation	4,385	3,303	5,193	4,758	4,204	3,041	1,450
Vehicles	1,873	1,678	2,263	1,804	1,750	1,175	385
Gasoline and motor oil	1,047	759	1,225	1,246	993	764	354
Other vehicle expenses	1,176	732	1,401	1,389	1,096	800	473
Public transportation	288	133	304	319	366	302	238
Health care	899	305	796	986	1,132	1,340	1,487
Entertainment	1,040	678	1,288	1,209	851	604	291
Personal care	205	105	214	272	244	211	148
Reading	140	66	158	163	135	130	93
Education	312	601	343	416	139	88	101
Tobacco	225	151	260	299	221	173	65
Miscellaneous	311	129	381	421	291	172	135
Cash contributions	740	106	803	913	746	762	878
Personal insurances and pensions	2,023	814	2,554	3,017	2,233	778	229
Life and other personal insurance	302	57	337	640	360	220	86
Retirement, pensions, social security	1,721	757	2,216	2,377	1,873	558	142

<sup>1</sup> Income values are derived from the responses of only those units providing complete reports of income.

ing interesting results from the expenditure survey. As the survey continues, additional issues will be covered.

—FOOTNOTES—

<sup>1</sup> The terms "household" and "consumer unit" are used interchangeably throughout this text. However, the consumer unit definition is the accurate

one for this survey. The Consumer Expenditure Survey is described in detail in *BLS Handbook of Methods*, 1982, ch. 6. Survey results are presented in annual reports and bulletins, the most recent of which is *Consumer Expenditure Survey Results from 1984*, USDL 86-258 (Bureau of Labor Statistics, June 22, 1986).

<sup>2</sup> The Consumer Expenditure Survey is composed of two independent surveys: An Interview Survey and a Diary Survey. The results in this article are from the Interview Survey.

# European job creation in the wake of plant closing and layoffs

*Confronted with massive layoffs in recent years, firms, and often governments, have taken a variety of initiatives to stimulate business growth and job creation*

WILLIAM SCHWEKE AND DAVID R. JONES

Over the past decade, millions of American workers lost their jobs through plant closings and work force reductions. According to the U.S. Department of Labor, between January 1979 and January 1984, 11.5 million adult workers were laid off because of plant shutdowns or relocations, abolition of shifts or positions, or slack work. Nearly 5.1 million of these people were considered displaced, having held their former jobs for 3 years or more.<sup>1</sup>

By January 1984, 1.3 million of these workers were still unemployed, and of those, 500,000 had been out of work for 27 weeks or more.<sup>2</sup> Hundreds of thousands more had taken pay cuts and part-time jobs simply to regain employment.

Europe, too, has undergone a massive economic shakeout over the past few years, generating little or no employment growth (in contrast to the increase in jobs in the United States). At the end of 1984, unemployment rates were at double-digit levels in the Netherlands (15 percent), Great Britain (13 percent), and France (10 percent).<sup>3</sup> This economic turmoil has drastically affected certain communities as well. Particularly in the United Kingdom, areas characterized by "mono-industrialism" suffered unemployment levels far above 20 percent.

By comparison, the United States outperformed Europe in creating jobs for its people from 1970 to 1984. From 1974

to 1984, the U.S. economy generated more than 26 million jobs. Of the four largest European nations—with a combined labor market slightly larger than the United States in 1970—West Germany lost close to 1.5 million jobs and Great Britain, 820,000, while France and Italy did better, creating around 380,000 and 1.3 million jobs respectively.

While layoffs and shutdowns proceed on both sides of the Atlantic, the response of government and corporations to the problems created has been significantly more vigorous in Europe than in the United States. American corporations tend to provide, at best, severance pay, relocation assistance, retraining, or job counseling, or a combination of these benefits, for the workers they dislocate. And while the Federal Government will authorize \$195 million in 1986 to aid displaced workers through Title III of the Job Training Partnership Act, the program falls far short of helping all those in need, and fails to ensure that enough jobs are created or sustained to employ those trained.

In contrast, European corporations—often working in concert with local, regional, and central governments—in recent years have gone beyond traditional types of assistance to workers and communities.<sup>4</sup> While the programs vary considerably as to methods and scope, they share a common goal of stimulating job creation and new business growth in the wake of economic downturn. By examining both the achievements and limitations of these innovative efforts, American corporations can expand their repertoire of strategies for alleviating the problems of economic dislocation.<sup>5</sup>

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## Effects of streamlining

Across Europe, industrial sectors are experiencing thorough restructuring. In France and Great Britain, for example, nationalized firms have cut their labor forces and increased their productivity through eliminating less profitable facilities and investing in modern machinery. Corporate leaders see most of these changes as positive: many industries are leaner and more competitive, and new types of labor-management cooperation, such as quality circles, are emerging.

Yet, this industrial streamlining has proven devastating to thousands of workers and communities dependent upon corporations for employment. Continued stagnation in employment growth has provoked widespread alarm over the future of job creation. By the end of the decade, more than half of the unemployed in European countries will be long-term unemployed youth.<sup>6</sup>

However, Europeans in business, government, and labor increasingly are seeing entrepreneurship as the key to solving these labor market problems. Public and private corporations are fostering a wide range of business development options, in concert with such adjustment assistance measures as training, early retirement, severance benefits, job placement and development, and financial and employment counseling.

Great Britain, France, and Italy offer the most promising examples of corporate job creation to address economic dislocation. Because the roles of government and unions differ considerably from country to country—and even from plant closing to plant closing—the initiatives discussed in this report will be examined in the context of their national economic circumstances. Having assessed the successes and failures in each country, we then will note the patterns that cut across national boundaries and discuss the implications for U.S. public policy.

### Great Britain

Great Britain has endured continued high levels of unemployment since 1980. While the government of Prime Minister Margaret Thatcher has pursued some direct employment measures, it is corporations that have spurred the most successful initiatives. In the process, these companies have learned the value of forming partnerships with local and regional governments and voluntary organizations to achieve their goals.

*BSC Industry, Ltd.* This program, begun nearly a decade ago by the country's nationalized giant, British Steel Corporation, serves as Europe's showcase example of job creation and new business formation. BSC Industry was established as a wholly owned subsidiary of the company to create jobs in communities and regions hit by steel mill closures (British Steel slashed its work force from 225,000 workers in 1975 to 71,000 employees in 1985).

BSC Industry initially focused on recruiting other large firms to distressed areas. This approach has gradually given way to a broader range of efforts targeted to smaller firms and would-be entrepreneurs. The subsidiary, which became independent of British Steel in 1984, now operates in 18 steel-mill closure areas. Its activities include marketing new images for depressed steel communities ("opportunity areas") to provide a supportive climate for indigenous business development and to attract outside employers; providing comprehensive business assistance, including seed financing and loans, to new and existing firms; converting outdated facilities into incubators (or "workshops") for entrepreneurs; and encouraging the formation of independent and public-private partnerships—known as Local Enterprise Agencies—to bring together community resources in a united effort to regenerate distressed steel communities. BSC Industry has merged its technical assistance operations with those of the Local Enterprise Agencies.

From 1975 to 1984, British Steel committed about £40 million to BSC Industry's activities. The results have been impressive: 2,000 companies have been assisted in creating 30,000 new jobs, with another 20,000 jobs to be filled in the near future. Eight entrepreneurial workshops house hundreds of businesses. The organization's loan programs provide crucial gap financing that the private sector has been unable to provide to more than 200 firms, with £8 million to £9 million out at any one time; 90 percent of the loans are equal to or less than £25,000 (approximately \$17,361).<sup>7</sup>

*Scottish Development Agency.* This is another organization taking a broad approach to the problem. The Scottish Development Agency was formed in 1975 by the merger of the Scottish Industrial Company with the National Investment Bank. It focuses on local small business development through factory building, management and marketing assistance, gap financing, and youth entrepreneurship development. One project, the Clydebank Enterprise Fund, has loaned nearly £700,000 (around \$486,108) to 50 local companies, most of them new business start-ups; over £2 million have been leveraged.

*Private corporate activity.* United Biscuits, British American Tobacco, and the glassmaker, Pilkington Brothers, have followed BSC Industries' approach and now offer financing, comprehensive business assistance, and unused land and buildings to small firms in communities hit by shutdowns. In plant closure situations, United Biscuits has financed local economic and community development feasibility studies, as well as provided "challenge grants" to match local job creation resources. It supports project Fullemploy, which provides intensive training, mainly for ethnic minorities, for retail and sales work and boasts a 70-percent placement rate.

## France

In France, larger firms must receive government approval before closing plants. Companies must offset the resulting job loss with job creation efforts. Thus, in contrast to Great Britain, the central government and unions in France serve as the main catalysts for responses to economic downturn. Nevertheless, a number of French firms like the Thomson Group, the BSN Group, St. Gobain, Rhone Poulenc, Elf Acquittance, and others, have gone far beyond mere adjustment assistance.

*SOFIREM.* The country's nationalized coal company, Charbonnages de France, has pioneered efforts to rebuild distressed industrial communities through its job creation subsidiary, SOFIREM (Societe Financiere pour Favoriser l'Industrialisation des Regions Minières). The central government empowered SOFIREM to offer a financial package of equity, loans, and subsidies to entice large firms to distressed coal communities. In addition, SOFIREM helped create 30 businesses in 1984 and another 30 in 1985, and plans on fostering another 70 over the next 2 years. Its Industrial Fund uses 300 million francs (approximately \$43 million) annually for constructing buildings, promoting exports, providing training, and conducting feasibility studies.<sup>8</sup>

*SOPRAN.* Rhone Poulenc, a large chemical company, created SOPRAN (Societe pour la Promotion d'Activites Nouvelles) as a separate company in the late 1970's to create employment for workers it laid off. Along with providing adjustment assistance—early retirement for former employees 55 years and older and transfer rights to displaced employees—SOPRAN is currently helping about 40 people start their own firms. More than 1,200 new jobs have been created through SOPRAN'S efforts—about half of them going to former employees, a much higher ratio than BSC Industry has achieved. Each job has cost Rhone Poulenc roughly 65,000 francs (\$9,312), a small sum compared with the cost of similar programs in other countries.<sup>9</sup>

*St. Gobain.* This company, which produces products for automobiles and construction, provides transfer assistance to displaced employees and technical and financial assistance to developing, small- to medium-sized firms. Working through five decentralized regional delegations, the St. Gobain Development Service has helped 230 businesses, creating 5,050 jobs, over the past 3 years. Of these firms, about 150 were established, growing companies, while 50 were start-ups, and 30 were new businesses attracted.<sup>10</sup>

Loans are typically extended for 10 years at the modest interest rate of 6 percent. The size of the loan is geared to the number of jobs involved, with the company aiming to spend 10,000 to 50,000 francs (\$1,432 to \$7,163) per job. If a former employee of St. Gobain is hired, the loan is changed into a direct grant.

## Italy

*Montedison.* In Italy, as in France, the central government and unions provide most of the impetus for corporate job creation. A major exception is Montedison, a large diversified firm, that, on its own, has undertaken broad efforts to aid small- and medium-sized firms. Montedison helps small businesses in economically depressed southern Italy to qualify as its suppliers. It also assists new and established businesses throughout Italy, regardless of whether they are in industries related to Montedison's products or needs. Unlike many other European business assistance programs, Montedison shies away from financing in favor of providing such services as regulatory assistance, infrastructure design, and foreign marketing.

*ENI.* The giant petrochemical conglomerate ENI (Ente Nazionale Idrocarburi) has worked since 1978 on promoting industrial diversification and providing alternative employment for laid-off employees. Its activities center on aiding small and new businesses. Working in eight "crisis areas," ENI has helped create 1,000 jobs and has provided vocational training for another 3,400 workers.<sup>11</sup>

## Implications and possibilities

Perhaps most importantly, these new European initiatives show that corporations and governments can considerably expand their efforts to launch enterprise and job creation programs in response to industrial restructuring. In America, best corporate practices focus only on picking up the pieces after closures, whereas the European efforts cited the way to moving from mere reaction to proaction.

Second, the most successful of these efforts indicate ways for corporations to integrate social responsibility into mainstream business operations. By synthesizing their longer-term business strategy with their employment and adjustment concerns, corporations can find ways to serve their goals of launching new products and services, developing new business ideas, improving employee morale, encouraging entrepreneurial initiative, and maintaining good public relations. The success of SOFIREM in France and Montedison in Italy demonstrates how closely these concerns can be integrated.

Third, as the Organization for Economic Cooperation and Development has noted, companies have found that their natural partners in employment initiatives are local government and voluntary organizations.<sup>12</sup> Prior involvement in community affairs and knowledge of the local political situation and its actors are crucial. From the partnerships between schools and industry that United Biscuits has forged, to the Local Enterprise Agencies that BSC Industry created, Great Britain has taken the lead in this area.

Fourth, the European actions suggest possibilities for union and community negotiations over closings. The initiatives serve as precedents for crafting either formal closure

agreements or flexible responses to the impending problems that closures will generate.

Finally, a closely related point is the importance of prior notice of layoffs and shutdowns. This not only gives companies time to build partnerships with unions and communities; it is essential for giving firms enough lead time to develop and launch new businesses. Being a day late may mean being a dollar short. SOPRAN reports that it takes at least 18 months to get a new plant into operation.<sup>13</sup> Graham Ledger of United Biscuits in Great Britain notes that his company gave a 3-year closure notice for its Liverpool facility, and, "We think we did it right."<sup>14</sup>

### Limitations

Like its achievements, Europe's problems with job creation are instructive. The chief barrier which European corporations have confronted is the nature of entrepreneurialism; it cannot solve all problems, nor should it be expected to do so. In particular, most initiatives have failed to integrate large numbers of blue-collar workers and their concerns into operation. Even BSC Industry has had very limited success in creating new jobs for displaced steelworkers.<sup>15</sup> Indeed, the program's leaders see its role as creating jobs in closure-affected communities, not as finding employment for displaced steelworkers.

This means that small and new business development must be complemented with more traditional strategies. For example, the Clwyd County Council and British Steel Corporation Industry in Great Britain and SOFIREM and St. Gobain in France have succeeded in attracting major new firms to their areas to supplement their work in indigenous business development.

Management problems pose a second major limitation. Many initiatives rely on inadequate assessments of local assets and liabilities. Then, too, the responses to problems tend to become formulaic; over and over, the same techniques—seed capital, workshops, and technical assistance—are used. New, riskier programs—such as the Clywd County Council's Project Live Wire for training young people as entrepreneurs—offer the promise of breaking the mold.

A third limitation arises from the very depth of the economic dislocation problem. In many communities, the amount of job creation is dwarfed by the numbers of jobs lost. The Organization for Economic Cooperation and Development (OECD) argues that it is impossible to estimate the number of jobs created by these initiatives. For instance, it is difficult to even define the terms "durable" job and "new" job. However, the Organization states that "it is hard to imagine that corporate job creation schemes have to date yielded much more than 100,000 new jobs in the whole of Western Europe."<sup>16</sup> Furthermore, it is virtually impossible to measure the number of second- and third-wave jobs created when new businesses start up.<sup>17</sup> In any case, these new initiatives can only deal in limited ways with the underlying

### Initiatives for Local Employment Creation

The growth of the Initiatives for Local Employment (ILE) program has been spearheaded by the failure of traditional solutions developed by central governments which attempt to produce satisfactory responses, let alone solutions, to the unemployment problems. The ILE program is run by a small team within the Organization for Economic Cooperation and Development (OECD) secretariat. Its function is to encourage cooperation, exchange, and analysis between the different participants in the program who meet regularly as the ILE's directing committee. The program's secretariat proposes and undertakes research and action; encourages and organizes the exchange of ideas, experience, and people; and assists countries in realizing the objectives of the program.

Taking part in the program are: Australia, Austria, Belgium, Canada, Denmark, Finland, France, Germany, Greece, Ireland, Italy, the Netherlands, Norway, Portugal, Spain, Sweden, Turkey, the United Kingdom, and the United States, and the Commission of the European Communities. Japan is an Observer Member.

The sharing and exchange of information and experience is a central and continuing part of the ILE program's work. This activity will increasingly provide a network of interested innovators with information drawn from seminars, case studies, and special studies. This information will be diffused through a liaison letter as well as through a series of publications—ILE Notebooks. In the long term, it is planned to establish an advanced communications system linking internationally a wide network of groups and individuals involved in local employment initiatives.

The ILE program welcomes any initiatives, ideas, proposals, or information. Also, any requests for documentation or arranging contracts should be addressed to:

OECD ILE Programme  
2, rue du Conseiller-Collignon,  
75116 Paris  
France

causes of closures and dislocation. (See box.)

Problems in corporate dealings with unions and local communities present a fourth limitation. Understandably, both labor and management often feel compelled to debate the plant closure decision itself, preventing the timely development of contingency plans for creating new jobs. Similarly, many projects fail to involve other community actors and neglect the creation of new, community-based institutions to carry forward a longer-term renewal strategy.

Finally, disseminating these models to the United States requires considerable translation. European corporate leaders see themselves as responsible to a broader set of stakeholders than do their American counterparts, who tend to weigh shareholder concerns more heavily.

### New corporate roles

While altruism plays a role in the European initiatives discussed, time and again, corporate leaders in the three

countries cited corporate self-interest as a motivating factor. Targeted business investment can help diminish pressing social problems that, if neglected, eventually can undermine business profits and long-term investment opportunities.

Such investments may prove especially important in lay-off situations where firms plan to maintain operations. This not only generates goodwill among labor and the community, but also helps prevent the local business climate from unraveling to the point where the costs of doing business increase and retaining quality management and employees becomes prohibitive. As an executive of the British firm Pilkington Brothers noted, "You can't operate behind

barbed wire. You can't operate in an area with 30 percent unemployment. You have to deal with the problem."<sup>18</sup>

Most of the job-creating tools, including incubators, technical and financial assistance, and entrepreneurial training, are already in place in the United States; in fact, options such as venture capital are far more abundant here than overseas. What is needed by American leaders is an understanding of how specifically to apply these tools in ameliorating the devastating effects of layoffs and shutdowns. This report provides an introduction to these development tools. The detailed work on their application should be written by corporate and government leaders themselves. □

—FOOTNOTES—

ACKNOWLEDGMENT: Work on this article is based upon grants from two organizations: the German Marshall Fund of the United States which financed a 1985 research trip to France, Great Britain, the Netherlands, Italy, and West Germany and cofunded with the U.S. Economic Development Administration the development of a handbook on *Job Creation In the Wake of Plant Closings*. This manual will be published in the fall of 1986.

<sup>1</sup> *Technology and Structural Unemployment: Re-employing Displaced Adults*, OTA-ITE-250 (U.S. Congress, Office of Technology Assessment, 1986), p. 1.

<sup>2</sup> *Ibid.*, p. 7.

<sup>3</sup> Corporation for Enterprise Development, *Job Creation In The Wake of Plant Closings* (Washington, 1985), p. 1.

<sup>4</sup> Obviously, U.S. companies have been very active in the corporate responsibility and enterprise development fields for a number of years and have, in fact, been in the vanguard. American corporate philanthropic practice dwarfs that of Europe. (One of the principal reasons is that Europe's much more extensive safety net has not encouraged the development of this sector.) Yet, despite U.S. pathbreaking actions in urban development, antipoverty initiatives, and so on, these efforts have not focused on the issues of economic dislocation. Instead, initiatives from corporations like the Control Data Corporation to create small business incubators have been responses to the broader problems of new technology development and small business assistance. The sole U.S. exceptions are the Brown and Williamson Corporation which paid for a reuse plan for a closed facility in Petersburg, VA, and Levi Strauss and Company which hired The Corporation for Enterprise Development to develop an economic development feasibility study in two communities in rural Tennessee where they closed branch plants.

<sup>5</sup> Readers interested in more on this subject should know that the Organization for Economic Cooperation and Development in Paris publishes a wealth of books, articles, monographs, and memoranda on employment

policy, labor market demographics, and enterprise development. Its Initiatives for Local Employment Creation (ILE) program collects and disseminates information on local employment information, including publishing a newsletter. (See box; and for more information, contact: Chris Brooks, OECD, Local Employment Initiatives Programme, Monaco Annex, Rue du Conseiller, Collignon, 75775 Paris, France.)

<sup>6</sup> Organization for Economic Cooperation and Development (OECD), *High Level International Conference on the Role of Large Firms In Job Creation and Entrepreneurship*, SME/ILE/85-13 (Paris, November 1985), p. 1.

<sup>7</sup> Interview with Brian Margaret, Wales Director, British Steel Corporation Industries, 1985.

<sup>8</sup> Interview with Bernard July, SOFIREM, 1985.

<sup>9</sup> Jocelyn Gutches, *Employment Security In Action: Strategies That Work* (New York, Pergamon Press, 1985), p. 147.

<sup>10</sup> Interview with Monsieur Guiu, General Director, St. Gobain Development, 1985.

<sup>11</sup> Interview with Gustavo DeSantis, Research Director, Ente Nazionale Idrocarburi (ISVET, ENI), 1985.

<sup>12</sup> OECD, *International Conference*, p. 2.

<sup>13</sup> Gutches, *Employment Security*, p. 153.

<sup>14</sup> Interview with Peter Shepherdson, General Manager, New Opportunities, Pilkington Brothers, 1985.

<sup>15</sup> OECD, *International Conference*, p. 8; and Gutches, *Employment Security*, p. 153.

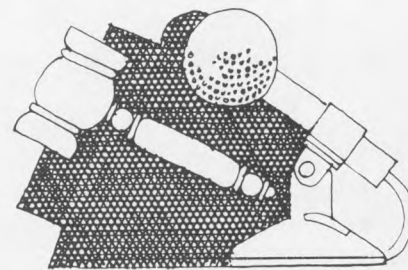
<sup>16</sup> OECD, *International Conference*, p. 3.

<sup>17</sup> *Ibid.*

<sup>18</sup> Shepherdson interview.



# Conventions



## Constitutional convention marks golden anniversary of the UAW

HENRY GUZDA

The United Automobile, Aerospace and Agricultural Implement Workers of America (UAW) ended a 2-year celebration with the close of their 28th constitutional convention (UAW conventions are triennial), held June 1–6, in Anaheim, CA. It marked the culmination of the UAW's golden anniversary (1935–85), 50 years of social and economic progress. The celebratory theme, "We make our own history," was replete with allegories and accounts of the union's existence, highlighted by an episodic pictorial exhibit of that struggle: photos of the 1937 sit-down strike against General Motors; pictures on the beatings delivered to union organizers Walter Reuther and Richard Frankensteen in the infamous "Battle of the Overpass"; scenes of production lines manned by UAW-CIO members who helped to make the U.S. Army "go and grow" during World War II; and photos spanning a decade of activism by the UAW in the civil rights movement. Every guest speaker and union official invoked the name and memory of past heroes and events.

The union's stormy past reflected poignantly on an equally turbulent present. Thousands of auto industry jobs have shifted to foreign shores, and many American automakers have asked the union for further sacrifices in the form of collective bargaining concessions to remain competitive in a global economy. The new industrial relations system (a term to describe the current mode of cooperative labor-management relations vis-a-vis an adversarial one) has confused and upset some rank-and-file UAW members, provoking emotional debate among the 2,500 delegates over the union's survival strategy. Complicating these internal problems was the decision by all but one of the UAW Canadian locals to secede and form their own union, the Canadian Auto Workers (CAW-Canada).

The convention climate, however, was upbeat and confident. Elected for a second consecutive 3-year term, UAW President Owen Bieber vowed to "go to war" to protect the union cause. While acknowledging the existence of internal union dissension caused by the tenor of troubled times, Bieber exclaimed that the "U" in UAW really does stand for

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"United." Industrial cooperation in today's economic world, he added, is imperative but also a two-way street.

### Fair trade, a key issue

High on the UAW list of convention priorities was the American trade imbalance and the erosion of our industrial base. The auto industry has lost 400,000 jobs to foreign competition since 1980, and the delegates place much of the blame on trade policies. The delegates supported several resolutions calling for a national industrial policy to increase our competitiveness with low wage standard nations and encourage productivity in the United States, including the general "Resolution on International Trade and Related Matters." This resolution supports domestic auto content legislation, recognition of unfair trade practices, trade adjustment assistance for U.S. workers displaced by foreign competition, affirmative Federal action to protect U.S. jobs, and penalties against nations which disregard worker rights.

The trade resolution also called on the Federal Government to protect the American industrial base. The shift in emphasis to service and information sector jobs—which organized labor views as low paying jobs—is detrimental to the U.S. economy, stated several delegates from the floor. The delegation also voiced support for H.R. 4800, a trade bill passed by the U.S. House of Representatives and awaiting action by the U.S. Senate, that they believe will remedy some of the problems addressed at the convention.

Other convention speakers also focused on this theme. Senator Howard Metzenbaum, from a "rust belt" State with serious employment and trade problems, told the gathering that worker solidarity on a national industrial policy was imperative because nations with even lower wage rate structures than our current chief competitors are planning to export autos to the United States. Murray Finley, president of the Amalgamated Clothing Workers, reminded the delegates that all of U.S. industry faces this problem, and Shiro Umemura, acting president of the Japanese Auto Workers, underscored the need for global worker solidarity. Bieber had previously educated the audience about current and future plans by Brazil, Yugoslavia, The People's Republic of China, and South Korea, all with auto worker wage rates under \$1 an hour, to export cars to the United States. Herman Rebhan, General Secretary of the International Metal Workers Federation—a body of auto worker and related trades organizations in the noncommunist world—discussed the lack of worker rights in these nations. The trade resolution calls for denial of favored-nation status to polities like Korea because of worker rights violations.

To complement the message delivered from the speakers' podium, the delegates held a spirited floor demonstration. Carrying placards calling for Federal support of plant closing legislation, protection against pension plan failures, and support of trade bill H.R. 4800, the delegates paraded around the convention floor while a speaker read out the names and locations of the participating locals: a litany of rust belt cities and towns. The demonstration was organized by the UAW's Industrial Parts Supplier Department, whose members have been deeply affected by the use of foreign parts in auto manufacturing. The resolution was vociferously adopted by the delegates.

### Internal affairs

The UAW's reputation for honesty and internal democracy has been tarnished by recent events, but the convention quickly reapplied the lustre. Most embarrassing for the union was the conviction of Frank Runnels, director of region 1-E, for taking kickbacks from workers' compensation lawyers. The UAW executive board removed him from office following the conviction and confirmed their decision at the convention by consolidating region 1-E with region 1-A under director Earnest Lofton. The convention condemned Runnels' betrayal of his stewardship.

The union conducted additional housecleaning. Several officials from Chicago were reprimanded by the UAW Public Review Board, an oversight body of distinguished academics, for improper administration of pension funds. No other major union has such an internal oversight body.

More damaging in substance than reputation was the secession of the Canadian locals from the UAW. In 1984, Canadian auto worker locals, under the direction of UAW Vice President for Canada Robert White, requested broad autonomy in the administration of their affairs. The UAW executive board ruled the request excessive and demanding of more powers for White than were endowed to international President Bieber. Consequently, the Canadians established *de facto* independence in 1985, and made it *de jure* through the formal procedures of the convention. Amended constitution article 53 transferred property and more than \$30 million to the new CAW-Canada. The UAW lost about \$15 million per year in dues, but retained its international status through the Wallaceburg, Ontario, Local 251, with 1,800 members, which voted to remain in the Detroit-based union.

President Bieber and the delegates prologued the amicable separation, extending a friendly hand to the new union and promising to keep the lamp of hope lit for a future reconciliation. The departure of 120,000 Canadian members drops UAW membership to about 1.1 million, the lowest total since 1961.

The issue of Canadian autonomy reflected upon a proposed resolution for direct elections of union officials. Twenty locals submitted 31 resolutions on the adoption of a referendum system to replace the convention/delegate sys-

tem. Proposals ranged from simple direct rank-and-file voting for international officers to conducting referenda on all important issues. Supporters argued that a change would stimulate internal democracy and make the international leadership more responsive to the wants and needs of grass roots membership. They blamed the convention system for encouraging abuses in some other international unions.

However, the constitutional committee of the convention encouraged retention of the existing system. Referendum voting, they argued, could engender constant factionalism and infighting which might open the UAW to monitoring by government agencies or other bodies. They believed incumbents would have unfair advantages which might lead challengers to seek assistance from sources not having the best interests of the union as a priority. According to the committee report, only two major unions, the Steelworkers and Mineworkers, still utilize the referendum system; the Electrical Workers union (IUE) switched to the convention format in 1978 to alleviate administrative problems. Considerable debate followed the committee report, and the convention eventually agreed to retain the current system.

Appropriately, the elections procedure debate fueled the controversy in a particularly intense contest for director of UAW region 5, comprising south central States. Incumbent Ken Worley defeated insurgent candidate, and onetime assistant, Jerry Tucker by a single vote, 325-324. Tucker's "New Directions" movement contested the eligibility of several delegates and convinced the entire convention to postpone Worley's installation as regional director until the credentials committee could rule on the matter. After deliberation, the committee upheld Worley's election by an official tally of 324.577 to 324.416 (fragmented voting is common under the delegate system). All other regional directorships were decided by acclamation, except for one noncontroversial race.

At the international level, Raymond Majerus was reelected secretary-treasurer, with Odessa Komer, Marc Stepp, Stephen Yokich, and Donald Ephlin retaining their respective vice presidencies. An attempt to remove Ephlin from office because of opposition to the Saturn agreement (discussed below) which he engineered failed when the dissidents' nominee refused to challenge. The delegates voted to increase the salaries of the president (from \$74,893.97 per year to \$82,268.76); the secretary-treasurer (from \$67,252.05 to \$74,359.37); international executive board members (from \$56,634.97 to \$63,360.34); and international representatives (from \$42,227.51 to \$48,151.12).

### Cosmic controversy

Paradoxically, the issue stimulating the most controversy and debate was one that procedurally belonged in the realm of a collective bargaining convention, not a constitutional one. Saturn, the name of both an innovative collective bargaining agreement and the new subsidiary corporation of General Motors, proposes to operate an auto factory in Spring Hill, TN, utilizing a cooperative labor-management

relations process. Workers will receive a salary in lieu of hourly wages, estimated at 80 percent of the industry average wage, but will be eligible for performance bonuses. Under the participatory management provisions of the agreement, workers will have positive roles in company decisionmaking. Another key provision of the contract is protection against layoffs. Also, management can utilize workers in a variety of job categories because the myriad of job classifications in the traditional auto factory have been greatly reduced.

Some dissidents charged that this departure from the traditional collective bargaining process places the worker on "the sacrificial altar of industry domination." It is concessionary, they charge and, citing the many violent struggles the union has fought to get current wage and benefit levels, insist that it endangers the future existence of the trade union movement. Victor Reuther, a UAW cofounder, has served as the symbolic leader of this group.

Under article 19 of the union's constitution, the dissidents succeeded in getting the floor to debate Saturn. Delegates Peter Kelley of Local 160 and Al Gardner of Local 600 argued that the article's section 3 prohibited union officials from negotiating contracts without prior approval and ratification by workers in the collective bargaining unit. Given that the workers for Saturn have not been hired, they claimed the agreement was invalid. In addition, they challenged the agreement for violating section 6 of the same article which states that the executive board shall not encourage rivalry among locals and shall protect superior agreements. Gardner charged that Saturn allowed "whipsawing" of one local against another because its concessionary provisions would cause employers to demand similar contract concessions from other locals. The protests noted that officials of Chrysler Corp. and General Motors have hailed the future "Saturnization" of the auto industry.

The Saturn debate lasted 2 hours and extended the convention well past the scheduled recess time, with the delegates eventually voting to table the issue for the proper forum of the 1987 collective bargaining convention. But the catalyst for convention action was Bieber. He pleaded with the delegates not to tie the hands of the executive board by abrogating the agreement and thereby create another unorganized auto plant. The Saturn experiment was a conduit through which the UAW would get its foot in the door of a right-to-work area and then branch out to organize the nearby Nissan factory in Smyrna, TN, and the proposed Toyota plant in Georgetown, KY. Citing the joint GM-Toyota venture in Fremont, CA (New United Motor Manufacturing, Inc.), Bieber reminded the convention that the UAW members working there would have lost their jobs to plant closure if not for the implementation of a cooperative concept. He also reminded the dissidents that Chrysler Corp. failed to get Saturn-like agreements in collective bargaining contracts negotiated in 1985, and that once hired, the work force at Saturn could vote to change conditions. The dele-

gates supported Bieber. (As the UAW debated the issue, the National Labor Relations Board upheld the UAW-Saturn pact as legal and not in conflict with Tennessee right-to-work or Federal laws as charged by the National Right-to-Work Committee.)

A milder controversy arose over the question of dues payments. A resolution called for supplemental funding for the UAW Walter and May Reuther Educational Center in Black Lake, MI, appropriated from dues payments. Dues are collected on 2 hours pay per month for each individual and surpluses over the \$500 million strike fund are rebated to locals. Some delegates, not opposing aid for the educational center, used the opportunity of debate to criticize procedures approved at the 1983 convention for taking extra dues from members based on bonuses and profit-sharing amounts. The anti-Saturn delegates charged that this system aided the cause of employers who desired bonuses and profit-sharing pay increases over the annual improvement wage plan. A third protest contingent argued that bonuses and profit-sharing sums were not wages and should not be considered in dues payments. Protests notwithstanding, the delegates voted to accept the resolution designed by the constitutional committee for additional funding of the educational center and continuance of the dues system adopted at the 1983 convention.

Other resolutions were recommended and adopted with little controversy. The UAW reaffirmed its commitment to social and economic progress by supporting women's rights, the concerns of the needy, civil rights, protection of the environment, and similar concerns.

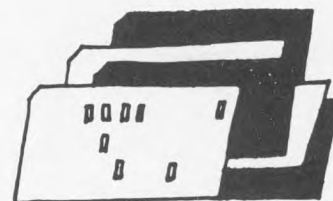
### **Solidarity forever**

Historically, the UAW has sought to build bridges of cooperation with others in the labor movement. This convention reinforced that effort. The UAW cancelled reservations at the Disneyland Hotel to honor picket lines of the Hotel Employees and Restaurant Employees Union, depriving the struck hotel of an estimated \$600,000 in revenue. The convention promised more assistance for distressed unions as when the UAW sent supplies to the flood ravaged coal miners of West Virginia in 1985.

Just as important was the international flavor of the convention's call for worker solidarity. The UAW invited trade unionists from 16 countries to attend, including Yugoslavia, Malaysia, India, and South Africa. Resolutions were adopted condemning suppression of workers' rights in Poland, South Africa, and Chile.

Bieber's keynote address contained a fitting summation for this convention and the end of the first 50 years of the union. "Brothers and sisters," he said, "there have been dark moments along our 50 years of struggle. By ourselves, we could not have survived, let alone prospered. We did—because we stood together." He then closed by paraphrasing labor's anthem, Solidarity Forever, stating, "together there is no power greater anywhere beneath the sun, for the UAW makes us strong." □

# Research Summaries



## BLS white-collar pay survey now covers small firms

JOHN D. MORTON

Clerical workers and recent hires in professional and administrative positions typically are paid 10 to 20 percent more in large firms employing 2,500 workers or more than in small firms employing 50 to 999 workers. In contrast, the pay advantage for fully experienced professionals in these large firms is usually under 5 percent. (See table 1.)

The national survey of professional administrative, technical, and clerical pay (PATC survey) in 1986 increased its coverage of firms with as few as 50 workers. As a result of the expansion, 156,000 establishments employing 33.5 million workers were covered in 1986 (previously, the survey covered 47,000 establishments employing 23.3 million workers). Establishments in Alaska and Hawaii are excluded. The survey is conducted by the Bureau of Labor Statistics, but survey occupations and coverage, such as establishment size and the private industries to be included, are determined by the President's Pay Agent (the Secretary of Labor and the Directors of the Office of Management and Budget and the Office of Personnel Management).<sup>1</sup>

In addition to the size of a firm's work force, skill and experience also influence white-collar pay, as can be readily seen from the survey results. (See table 2.) Engineers, the survey's most numerous occupational group, illustrate the effect of rising skill levels on pay: recent engineering graduates (level I) averaged \$27,866 annually in March 1986, while engineers responsible for highly complex engineering programs (level VIII) averaged \$79,021.<sup>2</sup>

In contrast, skill levels can act as a source of pay uniformity for the same level of work among different occupations. The following tabulation shows a relatively narrow (9 percent) spread separated the highest paid and lowest paid of six equivalent work levels in the survey:

Work levels	Annual salary level
Attorney IV .....	\$63,933
Director of personnel III .....	63,855
Chief accountant III .....	62,880
Accountant VI .....	61,546
Chemist VI .....	60,796
Engineer VI .....	58,883

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**Table 1. Relative pay levels by size of establishment, selected white-collar occupations in the national survey of professional, administrative, technical, and clerical pay, March 1986**

Job classification	Mean salaries for establishment size groups as a percent of surveywide averages			
	All establishments	50 to 999 workers	1,000 to 2,499 workers	2,500 workers or more
Accountants I .....	100	96	104	107
Accountants III .....	100	98	101	107
Accountants IV .....	100	99	101	102
Engineers I .....	100	93	102	104
Engineers III .....	100	97	104	101
Engineers IV .....	100	98	103	100
Computer programmers I .....	100	94	102	110
Computer programmers III .....	100	97	98	104
Computer programmers IV .....	100	98	98	102

NOTE: Level I staff are trainees; level III are experienced nonsupervisory staff working on conventional assignments; and level IV are experienced staff working on more complex assignments in a supervisory or nonsupervisory capacity.

Unequal market demands, however, can nullify this cluster effect. For example, average pay for beginning engineers in the survey was well above that of their accountant and chemist counterparts.

Although the PATC survey focuses on salary levels at a given time, its history permits a look at salary trends. White-collar salaries increased moderately between March 1985 and March 1986 in medium and large firms. Average salaries for most occupations surveyed rose between 3.0 and 5.5 percent—in line with gains reported a year earlier. In contrast, occupational salary increases averaged about 7 percent a year during the 1970's and more than 9 percent in 1981 and 1982. However, the rate of increase has been declining since 1982.<sup>3</sup>

A detailed analysis of white-collar salaries and complete results of this year's survey are included in the *National Survey of Professional, Administrative, Technical, and Clerical Pay, March 1986*, Bulletin 2271 (Bureau of Labor Statistics, 1986). The bulletin contains, for example, separate salary data by size of community and size of establishment. □

### FOOTNOTES

<sup>1</sup> The Pay Agent has designated the industrial coverage as follows: mining; construction; manufacturing; transportation, communications, and public utilities; wholesale and retail trade; finance, insurance, and real estate; and selected services. The pay-setting role of the PATC survey is described in George L. Stelluto's "Federal pay comparability: facts to temper the debate," *Monthly Labor Review*, June 1979, pp. 18-28.

**Table 2. Average salaries for selected occupations, national survey of professional, administrative, technical, and clerical pay, March 1986**

Occupation and class	Number of employees <sup>1</sup>	Average annual salaries <sup>2</sup>	Occupation and class	Number of employees <sup>1</sup>	Average annual salaries <sup>2</sup>
<b>Accountants and auditors</b>			<b>Chemists and engineers—continued</b>		
Accountants I	13,846	\$21,024	Engineers III	145,165	\$35,715
Accountants II	29,311	25,554	Engineers IV	157,033	42,677
Accountants III	46,228	31,143	Engineers V	111,913	50,769
Accountants IV	23,733	39,293	Engineers VI	52,105	58,883
Accountants V	8,227	49,231	Engineers VII	13,395	68,602
Accountants VI	1,397	61,546	Engineers VIII	3,097	79,021
Auditors I	1,756	21,545	<b>Technical support</b>		
Auditors II	2,928	26,108	Engineering technicians I	5,797	16,882
Auditors III	4,709	32,121	Engineering technicians II	17,342	20,312
Auditors IV	2,022	39,705	Engineering technicians III	32,193	23,896
Public accountants I	11,606	20,468	Engineering technicians IV	35,397	28,412
Public accountants II	11,595	22,714	Engineering technicians V	19,399	32,718
Public accountants III	8,897	26,633	Drafters I	2,982	13,054
Public accountants IV	4,275	32,116	Drafters II	12,102	15,854
Chief accountants II	1,454	47,963	Drafters III	25,970	20,201
Chief accountants III	475	62,880	Drafters IV	24,371	24,652
Chief accountants IV	230	80,409	Drafters V	14,362	31,004
<b>Attorneys</b>			Computer operators I	10,704	13,727
Attorneys I	1,377	31,014	Computer operators II	37,530	17,219
Attorneys II	3,199	39,635	Computer operators III	25,698	21,524
Attorneys III	4,347	50,119	Computer operators IV	8,059	24,550
Attorneys IV	3,500	63,933	Computer operators V	1,260	28,986
Attorneys V	1,847	78,396	Photographers I	401	16,636
Attorneys VI	587	101,169	Photographers II	873	22,896
<b>Buyers</b>			Photographers III	791	27,009
Buyers I	6,914	21,242	Photographers IV	331	31,584
Buyers II	22,990	26,369	Photographers V	104	35,094
Buyers III	18,323	33,580	<b>Clerical</b>		
Buyers IV	4,798	41,304	Accounting clerks I	36,023	12,517
<b>Programmers and systems analysts</b>			Accounting clerks II	133,183	14,687
Computer programmers I	15,974	20,832	Accounting clerks III	79,215	17,954
Computer programmers II	38,540	24,558	Accounting clerks IV	22,354	21,872
Computer programmers III	46,996	29,324	File clerks I	20,916	10,335
Computer programmers IV	21,524	34,919	File clerks II	10,110	12,156
Computer programmers V	9,492	42,934	File clerks III	2,100	15,625
Systems analysts I	21,402	29,141	Key entry operators I	68,827	13,146
Systems analysts II	47,518	34,881	Key entry operators II	30,770	16,901
Systems analysts III	38,943	41,997	Messengers	9,842	12,276
Systems analysts IV	15,506	49,515	Personnel clerks/assistants I	2,521	14,193
Systems analysts V	2,666	58,404	Personnel clerks/assistants II	4,414	16,903
Systems analysts VI	233	71,770	Personnel clerks/assistants III	3,255	19,696
<b>Personnel management</b>			Personnel clerks/assistants IV	1,298	23,702
Job analysts I	103	22,240	Purchasing clerks/assistants I	4,014	13,994
Job analysts II	350	25,288	Purchasing clerks/assistants II	5,585	17,282
Job analysts III	624	30,605	Purchasing clerks/assistants III	4,197	22,381
Job analysts IV	520	38,206	Purchasing clerks/assistants IV	1,037	29,384
Directors of personnel I	1,849	39,817	Secretaries I	59,859	16,326
Directors of personnel II	2,082	46,328	Secretaries II	69,450	18,306
Directors of personnel III	1,179	63,855	Secretaries III	110,604	21,152
Directors of personnel IV	395	75,170	Secretaries IV	49,403	23,839
<b>Chemists and engineers</b>			Secretaries V	16,038	28,051
Chemists I	3,580	22,539	Stenographers I	6,811	18,374
Chemists II	6,673	27,205	Stenographers II	5,648	21,739
Chemists III	10,244	34,141	Typists I	25,125	12,584
Chemists IV	9,257	41,548	Typists II	12,842	16,854
Chemists V	7,266	50,678	General clerks I	11,811	10,478
Chemists VI	3,632	60,796	General clerks II	59,359	12,730
Chemists VII	848	74,607	General clerks III	65,101	15,500
Engineers I	40,469	27,866	General clerks IV	33,472	19,322
Engineers II	71,336	31,194			

<sup>1</sup> Occupational employment estimates relate to the total in all establishments within scope of the survey and not to the number actually surveyed.

<sup>2</sup> Excludes premium pay for overtime and for work on weekends, holidays, and late shifts. Also excluded are performance bonuses and lump-sum payments of the type negotiated in the auto and aerospace industries, as well as profit-sharing payments, attendance bonuses, Christmas or year-

end bonuses, and other nonproduction bonuses. Pay increases—but not bonuses—under cost-of-living clauses and incentive payments, however, are included.

NOTE: The following occupational levels were surveyed but insufficient data were obtained to warrant publication: chief accountant I and V; director of personnel V; chemist VIII; computer programmer VI; and personnel clerk/assistant V. Published in 1986 but not in 1985 are photographer V, a new first level of purchasing clerk/assistant, and a newly added series of general clerks.

<sup>2</sup> In the survey coding structure, the level designations among various occupations are not synonymous: for example, the first level of attorneys equates to the third levels of engineers, accountants, and most other professional and administrative occupations. Classification of employees in the occupations and work levels surveyed is based on factors detailed in definitions which are available upon request.

<sup>3</sup> For a broader-based picture of wage and compensation trends in the United States, see the *Employment Cost Index*, a BLS quarterly news release.

## What happened to the high school class of 1985?

SHARON R. COHANY

Almost 3.3 million youths either graduated from high school or dropped out between October 1984 and 1985.<sup>1</sup> The proportion of graduates who enrolled in college set a record.<sup>2</sup> Graduates who did not attend college were typically in the labor force, and their unemployment rate was 11 percentage points lower than the 36-percent rate recorded for those who dropped out of high school and entered the labor force. The differing labor market experiences for these three groups highlight the fact that youth with educational deficiencies typically encounter work-related problems which may last for the rest of their lives.

### Going on to college

Reflecting the declining school-age population of the "baby-bust" generation, the high school graduating class of 1985 was smaller than those in recent years. A total of 2.7 million young people graduated from high school, down half a million from the peak reached in the mid-1970's. (See table 1.) Despite the smaller number, the proportion of seniors going on to college has been rising gradually over the past few years. It reached a record 58 percent in 1985, after hovering between 50 and 55 percent for most of the 1970's and early 1980's. (See table 2.)

*Sex.* In recent years, college enrollment rates for men and women just out of high school have drawn closer together, eliminating the wide differences that existed in the early 1970's. By 1985, enrollment rates for men and women were 59 and 57 percent, respectively. The rate for men had returned to the high levels recorded during the early 1970's—the tail end of the Vietnam-era's military draft—while that for women was at its highest level ever.

Once enrolled in college, men and women have roughly the same labor force participation rates—around 44 percent. Despite substantial increases in tuition and other college expenses, this overall participation rate has changed little

since the late 1970's. Grants, loans, family contributions, and summer earnings have continued to enable a majority of full-time students to stay out of the labor force during the school year.<sup>3</sup> (See table 3.)

*Race.* A large gap still exists in the proportion of black and white high school graduates who go on to college. In October 1985, the proportion of enrolled black seniors was 42 percent, compared with 59 percent for whites. Despite some improvement over the last few years, the black proportion was still well below their 46- to 48-percent range during the 1970's.

Large differences by race also persist with regard to labor force participation. Only 31 percent of the black college enrollees were in the labor force, compared with almost 47 percent of the whites. One reason for this difference was that a higher proportion of black students were enrolled in 2-year institutions, which are, on average, less expensive than 4-year colleges and universities.<sup>4</sup>

### Not going on to college

About 1.1 million members of the class of 1985 did not enroll in college. Their overall rate of labor force participation was 82 percent, somewhat lower than that prevailing during the past decade. Participation rates for men in this category were higher than those for women, and rates for whites were higher than those for blacks and Hispanics.

The incidence of unemployment for these high school graduates in the labor force has drifted upward during the 1980's. In 1985, about 1 of 4 were looking for work, compared with around 1 of 6 during the 1970's. Thus, despite a shrinking youth population and less competition for entry-level positions, young people who end their formal education with a high school diploma still have a hard time finding jobs. In part, this may result from the increasing demands of employers for better educated workers, given the higher educational level of the work force and a surplus of college graduates in some fields.<sup>5</sup>

### High school dropouts

A total of 612,000 youths dropped out of high school between October 1984 and 1985. This was about the same number as in the previous 2 years, but lower than in the 1970's, reflecting mainly the declining teenage population.

Male dropouts were much more likely to be labor force participants than the women, a fourth of whom had family responsibilities. One study showed that many of the young women who dropped out of high school as sophomores in 1980 gave such family-related reasons as marriage or plans to marry (31 percent), pregnancy (23 percent), and the need to support a family (8 percent).<sup>6</sup>

Leaving school before graduation particularly affects the labor force participation of black youth. While 72 percent of the white dropouts were in the labor force, only 52 percent

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**Table 1. School enrollment and labor force status of 1985 high school graduates and 1984-85 school dropouts 16 to 24 years old by sex, race, and Hispanic origin, October 1985**

[Numbers in thousands]

Characteristic	Civilian noninstitutional population	Civilian labor force				
		Number	Participation rate	Employed	Unemployed	
					Number	Percent of labor force
Total, 1985 high school graduates	2,666	1,610	60.4	1,292	318	19.8
Men	1,286	785	61.0	626	159	20.3
Women	1,380	825	59.8	666	159	19.3
White	2,241	1,383	61.7	1,177	206	14.9
Black	333	191	57.4	95	96	50.3
Hispanic origin	141	86	61.0	61	25	29.1
Enrolled in college	1,539	683	44.4	593	90	13.2
Men	754	327	43.4	280	47	14.4
Women	785	356	45.4	313	43	12.1
Full-time students	1,418	577	40.7	494	83	14.4
Part-time students	122	106	86.9	99	7	6.6
White	1,332	620	46.5	552	68	11.0
Black	141	44	31.2	29	15	(2)
Hispanic origin	72	37	(2)	32	5	(2)
Not enrolled in college	1,127	927	82.3	699	228	24.6
Men	532	458	86.1	346	112	24.5
Women	595	469	78.8	353	116	24.7
White	909	763	83.9	625	138	18.1
Black	192	147	76.6	66	81	55.1
Hispanic origin	69	49	(2)	29	20	(2)
Total, 1984-85 high school dropouts <sup>1</sup>	612	413	67.5	266	147	35.6
Men	321	261	81.3	163	98	37.5
Women	291	152	52.2	103	49	32.2
Single	220	117	53.2	78	39	33.3
Other marital status	72	36	(2)	26	10	(2)
White	458	330	72.1	214	116	35.2
Black	132	69	52.3	39	30	(2)
Hispanic origin	106	73	68.9	40	33	(2)

<sup>1</sup> Data refer to persons who dropped out of school between October 1984 and October 1985. In addition, 80,000 persons 14 and 15 years old dropped out of school during this period.

<sup>2</sup> Data not shown where base is less than 75,000.

NOTE: Detail for the above race and Hispanic-origin groups will not sum to totals because data for the "other races" group are not presented and Hispanics are included in both the white and black population groups. Because of rounding, sums of individual items may not equal totals.

of the black dropouts were. This was a much wider spread than for the graduates not enrolled in college.

Reflecting their relatively low skill and experience levels, recent dropouts have extremely high unemployment rates, nearly 36 percent in 1985. This jobseeking rate has averaged 35 percent thus far in the 1980's, compared with a 27-percent average in the 1970's. In this respect, the jobless picture for dropouts has paralleled the upturn in the unemployment rate for workers in general, although at much

higher levels.

Not surprisingly, dropouts also tend to come from families with lower income levels than high school graduates. For example, just 16 percent of dropouts are members of families with annual incomes of more than \$30,000, compared with 31 percent of high school graduates not enrolled in college, and 56 percent of high school graduates enrolled in college.

Looking down the road at adulthood, the earnings situation can be bleak for those who do not complete high school. As shown below, median earnings for high school dropouts who work all year at full-time jobs lag behind their better-educated peers throughout their working lives.

Age 16 to 24    Age 25 to 64

Total, year-round, full-time median earnings, 1984	\$11,537	\$20,752
Less than 4 years of high school	9,551	14,776
4 years of high school	11,331	18,350
1 to 3 years of college	11,897	21,079
4 years or more of college	16,470	27,777

The exceptionally high unemployment rates and poor earnings prognosis for dropouts suggest that a lack of liter-

**Table 2. Percent of recent high school graduates 16 to 24 years old enrolled in college, by year of graduation, sex, and race, selected years, October 1970-85**

[Numbers in thousands]

Year	Total graduates	Percent enrolled in college				
		Total	Men	Women	White	Black <sup>1</sup>
1970	2,757	52	55	49	52	48
1975	3,186	51	53	49	51	46
1980	3,089	49	47	52	50	43
1981	3,053	54	55	53	55	43
1982	3,100	51	49	52	52	37
1983	2,964	53	52	53	55	39
1984	3,012	55	56	54	58	40
1985	2,669	58	59	57	59	42

<sup>1</sup> Data prior to 1977 refer to black and other workers.

**Table 3. Labor force status of recent high school graduates and dropouts 16 to 24 years old, selected years, October 1970-85**

[Numbers in thousands]

Year	High school graduates						High school dropouts		
	Enrolled in college			Not enrolled in college			Civilian labor force	Labor force participation rate <sup>1</sup>	Unemployment rate <sup>2</sup>
	Civilian labor force	Labor force participation rate <sup>1</sup>	Unemployment rate <sup>2</sup>	Civilian labor force	Labor force participation rate <sup>1</sup>	Unemployment rate <sup>2</sup>			
1970 .....	509	35.7	16.1	1,027	77.2	18.1	427	60.0	25.5
1975 .....	641	39.7	11.7	1,281	81.2	19.9	462	62.6	34.0
1980 .....	662	43.4	12.5	1,339	85.0	19.0	485	63.8	31.5
1985 .....	683	44.4	13.2	927	82.3	24.6	413	67.5	35.6

<sup>1</sup> Labor force as a percent of population.<sup>2</sup> Unemployed as a percent of labor force.

acy is a serious problem for unemployed youth. The study by the National Center for Education Statistics shows that about one-third of the the sophomores who had dropped out of high school reported their reason as poor grades, or that "school was not for me."<sup>7</sup>

—FOOTNOTES—

<sup>1</sup> Data in this report are derived primarily from information collected in the October 1985 Current Population Survey (CPS), conducted and tabulated for the Bureau of Labor Statistics by the Bureau of the Census. Most data relate to persons 16 to 24 years of age in the civilian noninstitutional population in the week ending Oct. 12, 1985. Because it is a sample survey, estimates derived from the CPS may differ from the actual counts that could be obtained from a complete census. Therefore, small estimates or small differences between estimates should be interpreted with caution. For further information on sampling reliability, see *Students, Graduates, and Dropouts, October 1980-82*, Bulletin 2192 (Bureau of Labor Statistics, 1983).

For the most recent report on this topic, see Anne McDougall Young, "Fewer students in work force as school age population declines," *Monthly Labor Review*, July 1984, pp. 34-37.

<sup>2</sup> Figures for recent high school graduates 16 to 24 years old and enrolled in college include only those in schools that grant academic degrees. However, there are sizable numbers of students in "special schools," offering business, health, trades, technology, and cosmetology programs, among others. The U.S. Department of Education estimates that there were 1.8 million 16- to 24-year-olds in these schools in 1982. For further information, see *Participants in Postsecondary Education: October 1982*, Bulletin 84-309 (National Center for Education Statistics, November 1984).

<sup>3</sup> See *Packaging of Grants, Loans, and Earnings for Financing Postsecondary Education*, Bulletin 83-220b (National Center for Education Statistics, February 1984), pp. 1-6.

<sup>4</sup> For additional information on school enrollment by race and data on tuition and other costs, see *Digest of Education Statistics, 1985-86* (Center for Statistics, U.S. Department of Education, 1986), pp. 109 and 158.

<sup>5</sup> Jon Sargent, "An Improving Job Market for College Graduates: The 1986 Update of Projections to 1995," *Occupational Outlook Quarterly*, Summer 1986, pp. 3-7.

<sup>6</sup> Samuel S. Peng, *High School Dropouts: Descriptive Information from High School and Beyond*, Bulletin 83-221b (National Center for Education Statistics, November 1983), pp. 1-9.

<sup>7</sup> Peng, *High School Dropouts*, pp. 4-6.



# Foreign Labor Developments



## ILO adopts asbestos standard; focuses on employment issues

TADD LINSENMAYER

The 1986 International Labor Organization (ILO) Conference agreed to new standards to protect workers from asbestos hazards and urged governments to adopt policies to reduce youth unemployment, create jobs through small enterprise development, and counteract the negative employment consequences of international debt. These standards were among the highlights of the 3-week Conference, held in Geneva, Switzerland, June 4 to 25, and attended by 1,800 delegates from 140 countries.

U.S. Secretary of Labor William E. Brock cited the nuclear disaster in Chernobyl as an example of the serious safety and health hazards which can be associated with some new technologies and called on the ILO and its members to intensify efforts to share information on such perils. Brock pledged to make greater use of the ILO's occupational health hazard alert system in developing safety and health standards for Americans.

The heart of the ILO's annual Conference is its standard-setting activities—the development of conventions, which are legally binding treaties when ratified by governments, and recommendations. In recent years, many ILO members have advocated slowing the pace in the development of new standards to allow governments time to act on those already on the books. (The ILO has adopted 162 conventions since its creation in 1919.)

The 1986 Conference adopted only two new standards: a convention and a recommendation on asbestos. The convention requires that ratifying governments develop national programs to prevent worker exposure to asbestos health hazards, including worker exposure limits and effective inspection programs. The convention prohibits the use of crocidolite—a type of asbestos considered particularly dangerous—as well as the spraying of asbestos. The question of banning other types of asbestos was left to the discretion of national governments. Special provisions deal with demolition of buildings containing asbestos, the handling and cleaning of work clothing, and environmental and medical surveillance. The asbestos recommendation covers

many of these same questions in greater detail.

The Conference also considered youth unemployment and small enterprise development. Unlike asbestos, these did not lead to new standards, but rather resulted in non-binding conclusions.

According to the U.S. Government representative, the work of the committee on youth was complicated by the efforts of some delegates to raise extraneous political issues. For example, the Soviet Union and certain Eastern European countries introduced a resolution which attempted to link youth unemployment to the arms race. While this resolution was never seriously considered, the youth committee did adopt a paragraph sponsored by its worker and employer members urging that “socially unproductive activities which pose a threat to peace should be redirected towards socially and economically productive activities . . .”

The Conference's conclusions on youth recognized that the modern sector of the economy in many countries has only a limited capacity to absorb the estimated 1 billion youth who will be in the world labor force by the year 2000—84 percent of them in developing countries. It advocated, therefore, that more resources should be focused on the creation of employment in the private sector, self-employment, and jobs for youth in the rural agricultural and nonagricultural sectors of the economy. The Conference also urged better-designed national training and educational programs that would provide “employable skills” to young jobseekers.

The Conference's conclusions on small enterprise development also dealt primarily with employment creation. The U.S. Government representative noted, for example, that two-thirds of the 43 million new jobs created in the United States since 1960 were in small businesses. The Conference called on governments to adopt policies to promote small enterprise development, including “simplifying and streamlining” government regulations which hinder the establishment of small enterprises. This latter point was qualified by an explicit recognition of the need for “fully protecting workers' rights.”

To assist entrepreneurs in establishing new enterprises, the ILO's conclusions call for national small enterprise development policies which include effective management training programs, the creation of technology centers, and financial assistance programs (including credit guarantees). The Conference also encouraged the ILO to expand its own small enterprise development efforts.

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Perhaps the most controversial issue during the Conference was a resolution on the employment implications of international debt. The worker delegates at the Conference, joined by a majority of governments, particularly from Latin America, supported adoption of a resolution calling on the ILO to become more involved in finding solutions to the debt problem. The resolution urged creditor governments to extend debt repayment schedules, reduce interest rates, and stabilize foreign exchange rates and commodity prices. It also called for a special "high-level" ILO meeting involving key government labor and finance officials, the heads of international financial organizations such as the International Monetary Fund, and worker and employer representatives. The purpose of this meeting would be to examine "the impact of international trade and financial and monetary policies on employment and poverty."

The sponsors of this resolution argued that the austerity programs required to cope with the debt crisis were leading to higher unemployment in many countries. They insisted that the ILO should work with the international financial organizations and with debtor and creditor governments to find more equitable solutions. Although the United States and most other Western governments opposed the resolution on the grounds that the ILO lacked both the responsibility and expertise to deal with international financial questions, it was adopted by a wide margin.

Almost equally controversial was the adoption, after more than 20 years of debate, of proposals to change the ILO's structure. Most of these proposals concern the ILO Governing Body, the organ responsible for budget and administrative decisionmaking. Specifically, the proposals would expand the Governing Body from 56 to 112 members and make all seats elective (presently, 10 of the 28 government seats are nonelective and reserved for the "states of chief industrial importance": United States, the Soviet Union, United Kingdom, France, Federal Republic of Germany, Italy, Japan, India, China, and Brazil. Other proposals relate to the election of the ILO's director general, the quorum needed for valid Conference votes, and procedures for considering resolutions which condemn ILO members.

The major point of controversy, according to U.S. Government Delegate Ambassador Robert W. Searby, stemmed from Soviet demands for guaranteed seats in the employer benches of the Governing Body. The employers have steadfastly refused to elect any Communist "employers" to the Governing Body, arguing that they are, in reality, agents of the government and not free employers.

According to Searby, the Soviets found themselves virtually without support for their proposal for guaranteed seats. (The majority of ILO members supported the ILO's principle of tripartism, including the autonomy of the worker and employer groups.) Unable to block final agreement on the

other structural proposals, the Soviets manifested their displeasure through a series of procedural maneuvers during the opening days of the Conference which thwarted, for 5 days, the start of the campaign which began with the committees on resolutions and the application of ILO standards. The Soviet opposition to these committees stemmed from their alleged underrepresentation of Communist employers (virtually the same complaint they have with the employer benches in the Governing Body). When the structure proposals were presented for a preliminary decision near the end of the Conference, the Soviets continued their protest campaign by insisting on time-consuming votes.

The Conference overwhelmingly approved the structure proposals as amendments to the ILO constitution and standing orders. The constitutional amendments must now be submitted to governments for ratification. None of the amendments will go into effect until they are ratified by two-thirds of the member governments, including 5 of the 10 states of chief industrial importance.

The Conference committee which deals with the application of standards—normally controversial because of its focus on significant human rights violations—was relatively quiet this year. Because of delays due to Soviet opposition to its composition, the committee considered far fewer cases than in previous years, and, according to U.S. members of the committee, considered no Soviet bloc cases. Of the three Soviet bloc cases identified for discussion by the committee, one (Poland's violation of trade union rights) could not be discussed because that government did not send a delegation to the Conference, in view of its announced withdrawal from the ILO. Two other cases (involving Nicaragua and Romania) could not be considered because those governments refused to attend the committee to discuss any of the allegations. The Soviet policy of boycotting the ILO's supervisory machinery provoked a strong reaction from the worker and employer members of the committee and from many governments, and promises to be a major issue at the 1987 Conference.

The Conference committee cited Iran for "continued failure" to eliminate discrimination against the Baha'i religious sect, and adopted "special paragraphs" expressing concern over the nonapplication of ratified conventions in Pakistan (forced labor and fee-charging employment agencies) and Bangladesh (treatment of tribal populations).

In other actions, the Conference adopted proposals to help the ILO offset budget shortfalls arising from the declining value of the dollar. (The ILO receives its income in dollars, but pays most of its bills in Swiss francs.) It also strongly urged, over U.S. Government objections, economic sanctions against South Africa as a weapon to eliminate apartheid. □

# Major Agreements Expiring Next Month

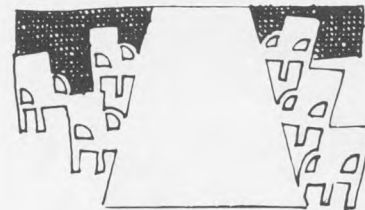


This list of selected collective bargaining agreements expiring in November is based on information collected by the Bureau's Office of Wages and Industrial Relations. The list includes agreements covering 1,000 workers or more. Private industry is arranged in order of Standard Industrial Classification.

Industry or activity	Employer and location	Labor organization <sup>1</sup>	Number of workers
<b>Private</b>			
Food products .....	General Foods Corp. (Battle Creek, MI) .....	Retail, Wholesale and Department Store	1,350
	Tropicana Products, Inc. (Bradenton, FL) .....	Teamsters (Ind.) .....	1,350
Fabricated metal products .....	Olin Corp. (East Alton, IL) .....	Machinists .....	2,300
Electrical products .....	Gibson Products Corp. (Greenville, MI) .....	Auto Workers .....	3,500
Transportation equipment .....	Dana Corp., Parish Division (Reading, PA) .....	Steelworkers .....	2,200
Instruments .....	Leeds and Northrup Co. (North Wales, PA) .....	Auto Workers .....	1,000
Miscellaneous manufacturing .....	Armstrong World Industries (Lancaster, PA) .....	Rubber Workers .....	1,600
Air transportation .....	American Airlines (Interstate) .....	Association of Professional Flight Attendants (Ind.)	6,200
Utilities .....	Columbia Gas Transmission Corp. (Interstate) .....	Oil, Chemical and Atomic Workers	1,000
Retail trade .....	Kroger Co. (Interstate) .....	Food and Commercial Workers	5,700
	Century Food Stores (Milwaukee, WI) .....	Food and Commercial Workers	2,000
Insurance .....	Blue Cross-Blue Shield of Wisconsin (Milwaukee, WI) .....	Office and Professional Employees	1,450
Real estate .....	Chicago walk-up apartments (Chicago, IL) .....	Service Employees	4,900
	Chicago fireproof buildings (Chicago, IL) .....	Service Employees	2,600
Services .....	Textile Maintenance Institute of Chicagoland, dry cleaning contract (Chicago, IL)	Textile Processors (Ind.)	1,700
	Textile Maintenance Institute of Chicagoland, laundry, linen and industrial contract (Chicago, IL)	Textile Processors (Ind.)	1,000
	Associated Press (Interstate) .....	Wire Service Guild, Newspaper Guild	1,400
	RCA Corp., RCA Service Co. Division (Interstate) .....	Electrical Workers (IBEW)	2,500
Amusements .....	Phonograph Record Labor Agreement (Interstate) .....	Musicians .....	6,000
Hospitals .....	Johns Hopkins Hospital (Baltimore, MD) .....	Hospital and Health Care Employees	1,400
	Major Honolulu hospitals (Hawaii) .....	Nurse's Association (Ind.)	1,500
<b>Public</b>			
Utilities .....	Arizona: Phoenix Salt River Project .....	Electrical Workers (IBEW)	3,500
General government .....	Michigan: Wayne County multiunit .....	State, County and Municipal Employees	3,000
Transit .....	Illinois: Chicago Transit Authority multidepartments .....	Transit Union	11,000
	Pennsylvania: Allegheny County Port Authority .....	Transit Union	2,550

<sup>1</sup> Affiliated with AFL-CIO except where noted as independent (Ind.).

# Developments in Industrial Relations



## New retirement system for Federal employees

Pension eligibility requirements, financing, and benefits were significantly revised under provisions of the Federal Employees' Retirement System Act of 1986. The new system (FERS), effective January 1, 1987, will cover all Federal civilian employees hired on or after that date and virtually all earlier hires with fewer than 5 years of nonmilitary service on December 31, 1986. Since January 1, 1984, these employees have been subject to interim retirement rules under which they are covered by both the existing Civil Service Retirement System (CSRS) and the Social Security system. However, they make reduced payments to the CSRS (1.3 percent of earnings instead of the usual 7 percent) and contribute the full employee share to Social Security.

Employees currently covered by the interim retirement rules with more than 5 years of service on December 31, 1986, will continue under the dual benefit coverage unless they opt to transfer to the FERS between July 1 and December 31, 1987.

Employees covered only by CSRS will remain under that system unless they opt to shift to the FERS. Eligibility for unreduced benefits under CSRS is age 62 after 5 years of service; age 60 after 20 years of service; or age 55 after 30 years (beginning in 2003, this age requirement will be increased, in stages, to age 57 in 2025). Retirement benefits continue to be based on the employee's average annual earnings during the three highest consecutive years. The formula is 1.5 percent of the average annual earnings figure for each of the first 5 years of service, plus 1.75 percent of the earnings figure for each of the next 5 years of service, plus 2 percent of the earnings figure for each year of service in excess of 10. For 30 years of service, the result is a benefit equal to 56.25 percent of the average annual earnings figure.

The FERS consists of three benefits—Social Security, CSRS, and a thrift savings plan.

Under Social Security, employees will pay a reduced Old Age, Survivors, and Disability Insurance (OASDI) tax of 5.7 percent (6.2 percent in 1990), in addition to the medicare tax which all Federal employees pay. The OASDI and medicare

taxes are applied on earnings up to a specified amount (currently \$42,000).

The second benefit is the CSRS, to which employees will contribute 1.3 percent of their annual earnings, dropping to 0.94 percent in 1988 and to 0.8 percent in 1990. Age and length of service requirements are as described above for employees staying in the CSRS. The annual benefit will be calculated at 1.0 percent of a retiring employee's average annual earnings for the three highest consecutive years, multiplied by the number of years of service. If the employee is age 62 or older at retirement, the calculation factor will be 1.1 percent. If younger, the employee will receive a supplement equal to the estimated Social Security benefit that would be payable based on current Federal service under Social Security, calculated as if the employee was age 62. The supplement, which is subject to reduction if outside earnings exceed limits, will cease at age 62, when the retiree begins drawing actual Social Security benefits.

The third benefit is a thrift savings plan. It offers three types of tax deferred investments: special Government securities, fixed income securities, and a stock index fund. The Government will contribute an amount equal to 1 percent of each employee's pay to the plan, even if the employee does not participate. In addition, the Government will contribute a dollar for each employee dollar contributed up to 3 percent of pay, and 50 cents for each employee dollar up to the next 2 percent of pay. The maximum employee contribution is 10 percent of pay.

Employees who opt for coverage by CSRS only may invest up to 5 percent of their pay in the special Government securities, but the Government will not contribute matching funds.

The Federal Employees' Retirement System Act limits automatic cost-of-living adjustments payable from the CSRS fund. Annual adjustments will be the actual 12-month rise in the BLS Consumer Price Index if it is less than 2 percent, 2 percent if the rise is 2 to 3 percent, and the rise minus 1 percentage point if the rise is 3 percent or more. The adjustments apply to all retirees, beginning at age 62. Previously, the formula provided for unreduced adjustments for all retirees, regardless of age.

The new retirement system is expected to save the Government \$42 million in 1987, rising to \$2.67 billion a year in 1991. Major changes also were made in the retirement system for military personnel. (See *Monthly Labor Review*, September 1986, pp. 39-40.)

"Developments in Industrial Relations" is prepared by George Ruben of the Division of Developments in Labor-Management Relations, Bureau of Labor Statistics, and is largely based on information from secondary sources.

## Entertainers settle, avert strike

A strike in the entertainment industry was averted when the Alliance of Motion Picture and Television Producers settled with two actors' unions in a 14-hour bargaining session. The last time members of the Screen Actors Guild and the American Federation of Television and Radio Artists struck was in 1980, when they were out for 10 weeks. This cost the industry a reported \$40 million and delayed the start of the 1980 prime time television season by 2 months.

Under the 3-year contracts, the \$361 minimum daily pay rate for actors was raised by 5 percent effective immediately, and by another 5 percent on January 1, 1988. In another compensation change, the actors will receive 4.5 percent of the producers' first \$1 million of annual gross receipts from the sale of videocassettes, plus 5.4 percent of sales in excess of \$1 million. They will also receive a \$3 million lump-sum payment. Previously, they received 3.6 percent of gross receipts.

There also were improvements in pension and insurance benefits and changes in affirmative action hiring, safety procedures for stunt people, and working conditions for child actors. The contracts cover 92,000 members of the unions, of whom only a small percentage are working at a given time.

## Lengthy talks between Delta, Air Line Pilots end

Thirteen months of negotiations between Delta Air Lines and the Air Line Pilots ended when the parties agreed on a 30-month contract that included a temporary two-tier pay system. A union official said Delta insisted on the two-tier system "for the perception" among its other employees, who are nonunion and are already covered by such plans, as well as for the resulting labor cost saving.

Under the system, new pilots are paid at 66 percent of the rates applicable to those hired earlier. After 5 years of service, the employees in the lower tier will move into the upper tier.

In another provision, the pilots agreed to fly 80 hours a month, a 5-hour increase. To some extent, the resulting savings will be offset by a requirement that the carrier increase the number of captains and first officers. Reportedly, Delta now has 4,200 pilots and plans to hire 50 a month for an indefinite period.

The contract also provides for cuts in paid vacation and leave time and changes in training, staffing, and hours of service which the union said will enable Delta to "compete effectively in the deregulated marketplace." In return for these changes, Delta agreed that there will be no job eliminations or downgradings stemming from the productivity improvements.

The contract, which is amendable on March 1, 1989, also provided for a 1-percent wage increase on January 1, 1988, and a 2-percent increase on January 1, 1989.

## Engineers at RCA get new contract

About 2,000 professional engineers at RCA Corp. facilities in Bloomfield, Camden, and Moorestown, NJ, were covered by a 3-year contract that provided for general salary increases of 3, 3, and 2.5 percent in the respective years, and minimum merit increases of 3 percent in each year for eligible employees. Engineers who are promoted will also receive lump-sum payments of \$400, \$600, or \$900.

The system of determining who will stay on the payroll in the event of operation cuts was modified to give engineers 9 "retention points" for completing 50 percent of the course work for a master's degree and 10 points for completing 75 percent of the requirements. Employees continue to receive 8 points for a bachelor's degree, 12 points for a master's degree, and 14 points for a Ph.D.

The union, the Association of Scientists and Professional Engineering Personnel, and RCA also adopted provisions to contain the rise in health care costs by more closely monitoring hospital stays and surgery.

## Delaney to head Locomotive Engineers

Discord within the Brotherhood of Locomotive Engineers was reflected in convention delegates' selection of Robert Delaney to head the union, replacing incumbent John F. Sytsma. Delaney, who will serve for a 5-year term, prevailed by a vote of 371 to 301. The discord resulted, in part, from Delaney's assertion that Sytsma had misused union funds and had rigged the outcome of a 1985 referendum in which he narrowly averted a recall that would have ended his second 5-year term of office. The resulting legal case is now before a Federal appeals court for a decision on whether the Department of Labor or a Federal district court should rule on the validity of the referendum results.

Convention delegates also criticized the union's December 1985 settlement with the Nation's railroads, contending that Sytsma erred in accepting terms—including cuts in some types of pay and revisions in work rules—similar to those negotiated by the rival United Transportation Union. (See *Monthly Labor Review*, January 1986, pp. 7-8.)

In other actions, the delegates cut the president's salary to \$100,000 a year, from \$145,000. Membership in the union stands at 31,000 today, including 5,000 retirees, compared with a peak of about 100,000 in the early 1940's.

## Clerks, meatcutters get lump-sum payments

In Eastern Pennsylvania, lump-sum payments were a feature of a settlement between Acme Markets and the United Food and Commercial Workers. About 2,400 clerks and meatcutters at 55 stores were covered by the 3-year accord. Each of the six semiannual payments will be calculated at 25 cents for each hour worked and each hour of paid leave during the preceding 6 months. Employees below the top scale are not eligible for the payments but they will continue

to receive progression step increases, which were set at 25 cents an hour (previously, the increases varied). Prior to the settlement, pay rates ranged from \$5.15 an hour for part-time clerks hired after June 22, 1980, to \$10.51 for meat department heads.

The parties also agreed to raise the top scale for part-time employees to \$6 an hour (from \$5.15), narrowing the difference with part-timers hired earlier, who are paid \$6.97. Acme also agreed to:

- Change 100 part-time workers to full time status.
- Restore to full-time status 50 employees who had been reduced to part-time status without fault.
- Raise the night work premium to 50 cents an hour from 25 cents.
- Make payments into the health and welfare fund for all hours worked. Previously, payments were made only for hours worked in excess of 90 a month.
- Raise the pension rate to \$20 a month for each year of credited service, from \$19, beginning January 1, 1987.

### **Drug store chains negotiate pattern contract**

In Southern California, the United Food and Commercial Workers and three drug store chains negotiated a contract that was expected to set a pattern for independent drug stores and pharmacies operated by grocery chains in the region. The three drug store chains that settled were Thrifty Drugs, Clark Drugs, and Sav-on Drug Stores, which for the first time coordinated their bargaining with the union. The 12,000 workers covered by the settlement consisted of 10,000 clerks at the three companies and pharmacists at Thrifty and Clark. (Sav-On pharmacists are represented by the Guild for Professional Pharmacists.)

The accord for the pharmacists provided for wage increases of 85 cents an hour on July 1, 1986, and 50 cents on July 1 of 1987 and 1988 and on January 1, 1989, bringing their pay rate to \$22.25 an hour. In July 1987 and January 1988, they will receive lump-sum payments based on hours worked during the preceding 6 months. The payments will be calculated at 25 cents and 50 cents an hour, respectively. Finally, the 3.5-cent bonus paid for each prescription filled in excess of 80 per shift was increased, in stages, to 10 cents.

A longtime, two-tier pay structure was eliminated by giving an immediate 21-cent-an-hour pay increase to top-scale clerks hired in 1969 or later, compared with 11 cents for those hired earlier. The result was a uniform \$8.35 rate, which will be increased by 10 cents in the third year. All top-scale clerks will receive four lump-sum payments over the term, each calculated at 20 cents for each hour worked during the preceding 6 months.

Clerks below the top rate will receive only progression increases during the term and the progression schedule was stretched to 5 years for those hired after July 1, 1986,

compared with the existing 20 months for those hired earlier.

Other provisions included:

- A 30-cent reduction in the employers' \$1.70 an hour payment into the health and welfare fund and the return of a \$6 million fund excess to the employers. The requirement that the stores provide whatever financing is needed to maintain benefits was eliminated. Instead, the stores will be subject to a possible obligation increase of up to 15 cents an hour in July of 1987 and 1988.
- A 5-cent reduction in the employers' 52.5-cent-an-hour pension fund obligation, also attributed to the healthy condition of the fund.
- Permission for vendors to stock and price merchandise as long as it does not result in the layoff of employees in the bargaining unit.
- An increase to four (formerly three) in the number of "management" employees in the store permitted to perform bargaining unit work.
- Elimination of the \$1 an hour premium for Sunday work for inexperienced employees hired after July 1, 1986.

In addition, jury duty makeup pay will now be paid only to full-time employees, new hires who had worked in the industry prior to 1969 will no longer be automatically entitled to start work at top scale, and new hires will now receive pay progression credit only for work performed in the industry during the last 5 years.

### **Nurses' contract provides pay increases**

The Washington Hospital Center and the District of Columbia Nurses Association negotiated a 27-month contract that provided for 3-percent salary increases in June and December of 1986, and 2-percent increases in June and December of 1987. In addition, each nurse will receive a regular 3.5-percent progression increase on his or her anniversary date in the second contract year. Such increases, which were made annually under the prior contract, were frozen during the first year of the new contract. The initial 3-percent wage increase brought hourly pay rates to \$11.36 for newly hired registered nurses, \$14.35 for those with 5 years' service, and \$18.33 for those at the top of the salary scale.

Nurses who work any of five paid holidays will now receive a \$50 a day bonus. The previous provision, which had applied to all nine paid holidays, continues to apply to the remaining four. Under that provision, nurses who work on a paid holiday receive another day off, instead of additional pay.

The accord continued a provision giving employees the choice of working Monday through Friday or on weekends. For weekend work, employees on the day shift receive 30 hours' pay for 24 hours' work and those on night shift receive 34 hours' pay for 24 hours' work. About one-third

of the 1,200 employees in the bargaining unit work exclusively on weekends.

Other terms include extension of unpaid maternity leave to 1 year, from 6 months, with an assurance that returning nurses will regain their job or one in the same specialty; and a requirement that the hospital give the union 30 days' notice of impending layoffs and negotiate which employees will be laid off.

### **City workers in Detroit end strike**

The city of Detroit and 7,000 members of the American Federation of State, County and Municipal Employees (AFSCME) ended a 19-day work stoppage by agreeing on a 3-year contract. The picket lines were observed by 5,000 other city employees, leaving the 1.2 million residents of the Nation's sixth largest city without bus, trash collection, and other services.

Following membership rejection of an earlier tentative settlement, the city asked a judge to order a return to work. The judge declined the request but did order the parties to resume bargaining, leading to the settlement.

The contract provides for a 5-percent wage increase and a \$500 lump-sum payment in the first year, a 3-percent wage increase and \$200 lump-sum payment in the second year, and a \$400 lump-sum payment in the third year, which could be raised to as much as \$800, depending on the city's financial condition.

A two-tier longevity pay system was eliminated by giving larger pay increases to workers in the lower tier. The city also agreed to finance a prototype day care facility and to give the union information on female employment for use in a pay equity study.

### **County employees subject to drug, alcohol testing**

In Florida, about 10,700 employees were covered by a settlement that gives Metro-Dade County the right to test them for alcohol or drugs as part of a regular physical examination or when the county has a "reasonable suspicion" of abuse. If a test result is positive, actions would range from counseling to dismissal, depending on the circumstances and the degree of cooperation by the employee.

The 3-year contract, negotiated by the State, County and Municipal Employees, also provided for 4-percent pay increases in the second and third years.

### **School system adopts merit pay for teachers**

Adoption of a merit pay plan for 8,300 teachers resulted from discussions between the Fairfax County, VA, school

system and the Fairfax Education Association. School superintendent Robert R. Spillane said the proposal would make Fairfax County "the first school system in the nation to really step out and do some things" recommended in recent reports by national panels on education reform.

Under the first stage of the plan, to begin with the 1987-88 school year, teachers would be denied longevity pay increases if they are rated unsatisfactory by their principals.

Beginning with the 1989-90 school year, the rating system would be expanded to five levels. Teachers in the lowest level would be dismissed and those in the next or "marginal" level would receive no salary increase or only a small increase. Teachers rated in the mid or competent level would receive a full salary increase. Those in the top two levels—"skillful" and "exemplary"—with 6 years' service would be eligible to move to a "career level two" status and receive a 10-percent salary increase after a further year of evaluation. According to the union, top-rated teachers with 26 years of service could earn as much as \$64,000 a year, compared with a current maximum of about \$44,000.

The rating of teachers would be decided by principals after consulting with two other classroom observers: a recognized outstanding teacher and a curriculum specialist. New teachers would be observed each year for the first 3 years, then once every 3 years, then every 4 years. Teachers could appeal their rating to a review board dominated by teachers.

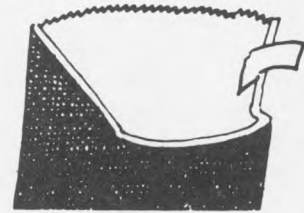
According to Spillane, the proposal calls for substantial salary increases to ensure the cooperation of teachers in the new system. The increases average 12.1 percent effective at the beginning of the 1987-88 school year and 8.8 percent at the beginning of the 2 following years. All three amounts include usual longevity step pay increases. Implementation of the proposal was contingent on allocation of the required money by the school board in its February 1987 budget decision, and on approval by county supervisors.

Members of the union, which is an affiliate of the National Education Association, favored the proposal in a September vote and ended a work-to-rule slowdown they had begun in December 1985 to protest the size of the salary increase (4 percent) they received in July 1985.

The revamping of the teacher rating system was opposed by another union, the 900-member Fairfax County Federation of Teachers, an affiliate of the American Federation of Teachers. Rick Nelson, president of the local union, said that the proposal was unacceptable because it would give principals too much power in deciding salary raises.

Under Virginia law, the unions could only meet and confer with Spillane rather than engage in legally binding collective bargaining. Fairfax County has the Nation's 10th largest school system. □

# Book Reviews



## The art of conflict resolution

*Techniques of Mediation.* By Walter A. Maggiolo. New York, Oceana Publications, Inc., 1985. 458 pp. \$45.

Walter A. Maggiolo is an acknowledged authority on conflict resolution and his book is the distillation of the experiences and techniques he used in cases spanning more than 33 years as a full-time professional mediator.

Arthur J. Goldberg, former Supreme Court Justice and Secretary of Labor, remarks in the foreword, "His book is an important text for an age which has come to recognize that conflict resolution by mediation is preferable to imposed solutions. It is must reading."

The author, building on his earlier book, *Techniques in Labor Disputes*, demonstrates the value of mediation in many areas. The major emphasis in *Techniques of Mediation* is on the practical rather than theoretical side. The book is a very successful attempt to assist mediators by describing and discussing techniques used in reaching constructive compromises.

All 32 chapters contained in this volume are written in a direct, succinct style with the practitioner always in mind. For example, chapter II is an excellent discussion of the differences between mediation and arbitration and conciliation and factfinding, as well as a description of how arbitration works, including the selection of arbitrators.

Chapter VII offers an insider's view on the history, activities, and recent changes in the Federal Mediation and Conciliation Service.

In the chapter, "Anatomy of a Mediator," the author lists 16 qualities required of a mediator. Two of these qualities struck a responsive chord—the patience of Job and the hide of a rhinoceros.

A major contribution that this book offers to the rapidly growing field of mediation is its specific treatment of topics, for example, intervention, creating doubt in the parties' minds, proposing alternate solutions, confidentiality, caucus, and aids used in reaching an agreement.

Jerome T. Barrett authored chapters on preventive mediation and ethical considerations in mediation. Barrett provides an insider's view of the Federal Mediation and Conciliation Service and an excellent review of dispute resolution in the public sector, a subject which has become critically important because of the dramatic growth of unionization among government employees.

One of the most informative chapters is the nonlabor

relations use of mediation, ranging from the homeowners' warranty program to age discrimination in employment.

The appendix contains a wealth of material, including all of the major statutes, arbitration rules and regulations, and codes of professional ethics of the major mediation organizations in the United States.

The book is a treasure house of information and practical techniques on the uses of mediation and is written in a highly readable style.

Goldberg is right. This is must reading for anyone interested in mediation.

—JOHN J. MARTIN  
Arbitrator  
Martin Associates, Inc.  
Falls Church, VA

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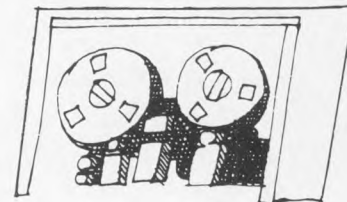
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# Current Labor Statistics



<b>Schedule of release dates for major BLS statistical series</b> .....	42
<b>Notes on Current Labor Statistics</b> .....	43
<b>Comparative indicators</b>	
1. Labor market indicators .....	52
2. Annual and quarterly percent changes in compensation, prices, and productivity .....	53
3. Alternative measures of wage and compensation changes .....	53
<b>Labor force data</b>	
4. Employment status of the total population, data seasonally adjusted .....	54
5. Employment status of the civilian population, data seasonally adjusted .....	55
6. Selected employment indicators, data seasonally adjusted .....	56
7. Selected unemployment indicators, data seasonally adjusted .....	57
8. Unemployment rates by sex and age, data seasonally adjusted .....	58
9. Unemployed persons by reason for unemployment, data seasonally adjusted .....	58
10. Duration of unemployment, data seasonally adjusted .....	58
11. Unemployment rates of civilian workers, by State .....	59
12. Employment of workers by State .....	59
13. Employment of workers by industry, data seasonally adjusted .....	60
14. Average weekly hours by industry, data seasonally adjusted .....	61
15. Average hourly earnings by industry .....	62
16. Average weekly earnings by industry .....	63
17. Hourly Earnings Index by industry .....	63
18. Indexes of diffusion: proportion of industries in which employment increased, seasonally adjusted .....	64
19. Annual data: Employment status of the noninstitutional population .....	64
20. Annual data: Employment levels by industry .....	64
21. Annual data: Average hours and earnings levels by industry .....	65
<b>Labor compensation and collective bargaining data</b>	
22. Employment Cost Index, compensation, by occupation and industry group .....	66
23. Employment Cost Index, wages and salaries, by occupation and industry group .....	67
24. Employment Cost Index, private nonfarm workers, by bargaining status, region, and area size .....	68
25. Specified compensation and wage adjustments from contract settlements, and effective wage adjustments, situations covering 1,000 workers or more .....	69
26. Average specified compensation and wage adjustments, bargaining situations covering 1,000 workers or more .....	69
27. Average effective wage adjustments, bargaining situations covering 1,000 workers or more .....	70
28. Specified compensation and wage adjustments, State and local government bargaining situations covering 1,000 workers or more .....	70
29. Work stoppages involving 1,000 workers or more .....	70
<b>Price data</b>	
30. Consumer Price Index: U.S. City average, by expenditure category and commodity and service groups .....	71
31. Consumer Price Index: U.S. City average and local data, all items .....	74
32. Annual data: Consumer Price Index, all items and major groups .....	75
33. Producer Price Indexes by stage of processing .....	76
34. Producer Price Indexes, by durability of product .....	77
35. Annual data: Producer Price Indexes by stage of processing .....	77
36. U.S. export price indexes by Standard International Trade Classification .....	78
37. U.S. import price indexes by Standard International Trade Classification .....	79
38. U.S. export price indexes by end-use category .....	80
39. U.S. import price indexes by end-use category .....	80
40. U.S. export price indexes by Standard Industrial Classification .....	80
41. U.S. import price indexes by Standard Industrial Classification .....	81

**Contents—Continued**

**Productivity data**

42. Indexes of productivity, hourly compensation, and unit costs, data seasonally adjusted ..... 81  
 43. Annual indexes of multifactor productivity ..... 82  
 44. Annual indexes of productivity, hourly compensation, unit costs, and prices ..... 82

**International comparisons**

45. Unemployment rates in nine countries, data seasonally adjusted ..... 83  
 46. Annual data: Employment status of civilian working-age population, ten countries ..... 84  
 47. Annual indexes of productivity and related measures, twelve countries ..... 85

**Injury and illness data**

48. Annual data: Occupational injury and illness incidence rates ..... 86

Schedule of release dates for BLS statistical series							
Series	Release date	Period covered	Release date	Period covered	Release date	Period covered	MLR table number
Employment situation .....	October 3	September	November 7	October	December 5	November	1; 4-21
Producer Price Index .....	October 10	September	November 14	October	December 12	November	2; 33-35
Consumer Price Index .....	October 23	September	November 25	October	December 19	November	2; 30-32
Real earnings .....	October 23	September	November 25	October	December 19	November	14-17
Major collective bargaining settlements .....	October 27	1st 9 months	.....	.....	.....	.....	3; 25-28
Employment Cost Index .....	October 28	3rd quarter	.....	.....	.....	.....	1-3; 22-24
Productivity and costs: Nonfarm business and manufacturing .....	October 29	3rd quarter	.....	.....	.....	.....	2; 42-44
Nonfinancial corporations .....	.....	.....	.....	.....	December 2	3rd quarter	2; 42-44
U.S. Import and Export Price Indexes ..	October 30	3rd quarter	.....	.....	.....	.....	36-41
Occupational injuries and illnesses .....	.....	.....	November 13	1985	.....	.....	48

## NOTES ON CURRENT LABOR STATISTICS

This section of the *Review* presents the principal statistical series collected and calculated by the Bureau of Labor Statistics: series on labor force, employment, unemployment, collective bargaining settlements, consumer, producer, and international prices, productivity, international comparisons, and injury and illness statistics. In the notes that follow, the data in each group of tables are briefly described, key definitions are given, notes on the data are set forth, and sources of additional information are cited.

### General notes

The following notes apply to several tables in this section:

**Seasonal adjustment.** Certain monthly and quarterly data are adjusted to eliminate the effect on the data of such factors as climatic conditions, industry production schedules, opening and closing of schools, holiday buying periods, and vacation practices, which might prevent short-term evaluation of the statistical series. Tables containing data that have been adjusted are identified as "seasonally adjusted." (All other data are not seasonally adjusted.) Seasonal effects are estimated on the basis of past experience. When new seasonal factors are computed each year, revisions may affect seasonally adjusted data for several preceding years. (Seasonally adjusted data appear in tables 1-3, 4-10, 13, 14, 17, and 18.) Beginning in January 1980, the BLS introduced two major modifications in the seasonal adjustment methodology for labor force data. First, the data are seasonally adjusted with a procedure called X-11 ARIMA, which was developed at Statistics Canada as an extension of the standard X-11 method previously used by BLS. A detailed description of the procedure appears in *The X-11 ARIMA Seasonal Adjustment Method* by Estela Bee Dagum (Statistics Canada, Catalogue No. 12-564E, February 1980). The second change is that seasonal factors are calculated for use during the first 6 months of the year, rather than for the entire year, and then are calculated at midyear for the July-December period. However, revisions of historical data continue to be made only at the end of each calendar year.

Seasonally adjusted labor force data in tables 1 and 4-10 were revised in the February 1986 issue of the *Review*, to reflect experience through 1985.

Annual revisions of the seasonally adjusted payroll data shown in tables 13, 14, and 18 were made in the July 1986 *Review* using the X-11 ARIMA seasonal adjustment methodology. New seasonal factors for productivity data in table 42 are usually introduced in the September issue. Seasonally adjusted indexes and percent changes from month to month and from quarter to quarter are published for numerous Consumer and Producer Price Index series. However, seasonally adjusted indexes are not published for the U.S. average All Items CPI. Only seasonally adjusted percent changes are available for this series.

**Adjustments for price changes.** Some data—such as the Hourly Earnings Index in table 17—are adjusted to eliminate the effect of changes in price. These adjustments are made by dividing current dollar values by the Consumer Price Index or the appropriate component of the index, then multiplying by 100. For example, given a current hourly wage rate of \$3 and a current price index number of 150, where 1967 = 100, the hourly rate expressed in 1967 dollars is \$2 ( $\$3/150 \times 100 = \$2$ ). The \$2 (or any other resulting values) are described as "real," "constant," or "1967" dollars.

### Additional information

Data that supplement the tables in this section are published by the Bureau in a variety of sources. News releases provide the latest statistical information published by the Bureau; the major recurring releases are published according to the schedule preceding these general notes. More information about labor force, employment, and unemployment data and the household and establishment surveys underlying the data are available in *Employment and Earnings*, a monthly publication of the Bureau. More data from the household survey are published in the two-volume data book—*Labor Force Statistics Derived From the Current Population Survey*, Bulletin 2096. More data from the establishment survey appear in two data books—*Employment, Hours, and Earnings, United States*, and *Employment, Hours, and Earnings, States and Areas*, and the annual supplements to these data books. More detailed information on employee compensation and collective bargaining settlements is published in the monthly periodical, *Current Wage Developments*. More detailed data on consumer and producer prices are published in the monthly periodicals, *The CPI Detailed Report*, and *Producer Prices and Price Indexes*. Detailed data on all of the series in this section are provided in the *Handbook of Labor Statistics*, which is published biennially by the Bureau. BLS bulletins are issued covering productivity, injury and illness, and other data in this section. Finally, the *Monthly Labor Review* carries analytical articles on annual and longer term developments in labor force, employment, and unemployment; employee compensation and collective bargaining; prices; productivity; international comparisons; and injury and illness data.

### Symbols

p = preliminary. To increase the timeliness of some series, preliminary figures are issued based on representative but incomplete returns.

r = revised. Generally, this revision reflects the availability of later data but may also reflect other adjustments.

n.e.c. = not elsewhere classified.

n.e.s. = not elsewhere specified.

## COMPARATIVE INDICATORS (Tables 1-3)

Comparative indicators tables provide an overview and comparison of major BLS statistical series. Consequently, although many of the included series are available monthly, all measures in these comparative tables are presented quarterly and annually.

**Labor market indicators** include employment measures from two major surveys and information on rates of change in compensation provided by the Employment Cost Index (ECI) program. The labor force participation rate, the employment-to-population ratio, and unemployment rates for major demographic groups based on the Current Population ("household") Survey are presented, while measures of employment and average weekly hours by major industry sector are given using nonagricultural payroll data. The Employment Cost Index (compensation), by major sector and by

bargaining status, is chosen from a variety of BLS compensation and wage measures because it provides a comprehensive measure of employer costs for hiring labor, not just outlays for wages, and it is not affected by employment shifts among occupations and industries.

Data on **changes in compensation, prices, and productivity** are presented in table 2. Measures of rates of change of compensation and wages from the Employment Cost Index program are provided for all civilian nonfarm workers (excluding Federal and household workers) and for all private nonfarm workers. Measures of changes in: consumer prices for all urban consumers; producer prices by stage of processing; and the overall export and import price indexes are given. Measures of productivity (output per hour of all persons) are provided for major sectors.

Alternative measures of wage and compensation rates of change, which reflect the overall trend in labor costs, are summarized in table 3. Differences in concepts and scope, related to the specific purposes of the series, contribute to the variation in changes among the individual measures.

#### Notes on the data

Definitions of each series and notes on the data are contained in later

sections of these notes describing each set of data. For detailed descriptions of each data series, see *BLS Handbook of Methods*, Volumes I and II, Bulletins 2134-1 and 2134-2 (Bureau of Labor Statistics, 1982 and 1984, respectively), as well as the additional bulletins, articles, and other publications noted in the separate sections of the *Review's* "Current Labor Statistics Notes." Historical data for many series are provided in the *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985). Users may also wish to consult *Major Programs, Bureau of Labor Statistics*, Report 718 (Bureau of Labor Statistics, 1985).

## EMPLOYMENT DATA

(Tables 1; 4-21)

### Household survey data

#### Description of the series

EMPLOYMENT DATA in this section are obtained from the Current Population Survey, a program of personal interviews conducted monthly by the Bureau of the Census for the Bureau of Labor Statistics. The sample consists of about 59,500 households selected to represent the U.S. population 16 years of age and older. Households are interviewed on a rotating basis, so that three-fourths of the sample is the same for any 2 consecutive months.

#### Definitions

**Employed persons** include (1) all civilians who worked for pay any time during the week which includes the 12th day of the month or who worked unpaid for 15 hours or more in a family-operated enterprise and (2) those who were temporarily absent from their regular jobs because of illness, vacation, industrial dispute, or similar reasons. Members of the Armed Forces stationed in the United States are also included in the employed total. A person working at more than one job is counted only in the job at which he or she worked the greatest number of hours.

**Unemployed persons** are those who did not work during the survey week, but were available for work except for temporary illness and had looked for jobs within the preceding 4 weeks. Persons who did not look for work because they were on layoff or waiting to start new jobs within the next 30 days are also counted among the unemployed. The **overall unemployment rate** represents the number unemployed as a percent of the labor force, including the resident Armed Forces. The **civilian unemployment rate** represents the number unemployed as a percent of the civilian labor force.

The **labor force** consists of all employed or unemployed civilians plus members of the Armed Forces stationed in the United States. Persons **not in the labor force** are those not classified as employed or unemployed; this group includes persons who are retired, those engaged in their own household work, those not working while attending school, those unable to work because of long-term illness, those discouraged from seeking work because of personal or job market factors, and those who are voluntarily idle. The **noninstitutional population** comprises all persons 16 years of age and older who are not inmates of penal or mental institutions, sanitariums, or homes for the aged, infirm, or needy, and members of the Armed Forces stationed in the United States. The **labor force participation rate** is the proportion of the noninstitutional population that is in the labor force. The **employment-population ratio** is total employment (including the resident Armed Forces) as a percent of the noninstitutional population.

#### Notes on the data

From time to time, and especially after a decennial census, adjustments are made in the Current Population Survey figures to correct for estimating errors during the preceding years. These adjustments affect the comparability of historical data. A description of these adjustments and their effect on

the various data series appear in the Explanatory Notes of *Employment and Earnings*.

Data in tables 4-10 are seasonally adjusted, based on the seasonal experience through December 1985.

#### Additional sources of information

For detailed explanations of the data, see *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 1, and for additional data, *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985). A detailed description of the Current Population Survey as well as additional data are available in the monthly Bureau of Labor Statistics periodical, *Employment and Earnings*. Historical data from 1948 to 1981 are available in *Labor Force Statistics Derived from the Current Population Survey: A Databook*, Vols. I and II, Bulletin 2096 (Bureau of Labor Statistics, 1982).

A comprehensive discussion of the differences between household and establishment data on employment appears in Gloria P. Green, "Comparing employment estimates from household and payroll surveys," *Monthly Labor Review*, December 1969, pp. 9-20.

### Establishment survey data

#### Description of the series

EMPLOYMENT, HOURS, AND EARNINGS DATA in this section are compiled from payroll records reported monthly on a voluntary basis to the Bureau of Labor Statistics and its cooperating State agencies by more than 250,000 establishments representing all industries except agriculture. In most industries, the sampling probabilities are based on the size of the establishment; most large establishments are therefore in the sample. (An establishment is not necessarily a firm; it may be a branch plant, for example, or warehouse.) Self-employed persons and others not on a regular civilian payroll are outside the scope of the survey because they are excluded from establishment records. This largely accounts for the difference in employment figures between the household and establishment surveys.

#### Definitions

An **establishment** is an economic unit which produces goods or services (such as a factory or store) at a single location and is engaged in one type of economic activity.

**Employed persons** are all persons who received pay (including holiday and sick pay) for any part of the payroll period including the 12th of the month. Persons holding more than one job (about 5 percent of all persons in the labor force) are counted in each establishment which reports them.

**Production workers** in manufacturing include working supervisors and all nonsupervisory workers closely associated with production operations. Those workers mentioned in tables 12-17 include production workers in manufacturing and mining; construction workers in construction; and non-supervisory workers in the following industries: transportation and public utilities; wholesale and retail trade; finance, insurance, and real estate; and

services. These groups account for about four-fifths of the total employment on private nonagricultural payrolls.

**Earnings** are the payments production or nonsupervisory workers receive during the survey period, including premium pay for overtime or late-shift work but excluding irregular bonuses and other special payments.

**Real earnings** are earnings adjusted to reflect the effects of changes in consumer prices. The deflator for this series is derived from the Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W). The **Hourly Earnings Index** is calculated from average hourly earnings data adjusted to exclude the effects of two types of changes that are unrelated to underlying wage-rate developments: fluctuations in overtime premiums in manufacturing (the only sector for which overtime data are available) and the effects of changes and seasonal factors in the proportion of workers in high-wage and low-wage industries.

**Hours** represent the average weekly hours of production or nonsupervisory workers for which pay was received and are different from standard or scheduled hours. **Overtime hours** represent the portion of gross average weekly hours which were in excess of regular hours and for which overtime premiums were paid.

The **Diffusion Index**, introduced in the May 1983 *Review*, represents the percent of 185 nonagricultural industries in which employment was rising over the indicated period. One-half of the industries with unchanged employment are counted as rising. In line with Bureau practice, data for the 1-, 3-, and 6-month spans are seasonally adjusted, while those for the 12-month span are unadjusted. The diffusion index is useful for measuring the dispersion of economic gains or losses and is also an economic indicator.

#### Notes on the data

Establishment data collected by the Bureau of Labor Statistics are periodically adjusted to comprehensive counts of employment (called "benchmarks"). The latest complete adjustment was made with the release of May 1986 data, published in the July 1986 issue of the *Review*. Consequently, data published in the *Review* prior to that issue are not necessarily comparable to current data. Unadjusted data have been revised back to April 1984; seasonally adjusted data have been revised back to January 1981. These revisions were published in the *Supplement to Employment and Earnings* (Bureau of Labor Statistics, 1986). Unadjusted data from April 1985 forward, and seasonally adjusted data from January 1982 forward are subject to revision in future benchmarks.

In the establishment survey, estimates for the 2 most recent months are based on incomplete returns and are published as preliminary in the tables (13 to 16 in the *Review*). When all returns have been received, the estimates are revised and published as final in the third month of their appearance. Thus, August data are published as preliminary in October and November and as final in December. For the same reason, quarterly establishment data (table 1) are preliminary for the first 2 months of publication and final in the third month. Thus, second-quarter data are published as preliminary in August and September and as final in October.

## COMPENSATION AND WAGE DATA

(Tables 1-3; 22-29)

COMPENSATION AND WAGE DATA are gathered by the Bureau from business establishments, State and local governments, labor unions, collective bargaining agreements on file with the Bureau, and secondary sources.

### Employment Cost Index

#### Description of the series

The **Employment Cost Index** (ECI) is a quarterly measure of the rate of change in compensation per hour worked and includes wages, salaries, and employer costs of employee benefits. It uses a fixed market basket of

#### Additional sources of information

Detailed data from the establishment survey are published monthly in the BLS periodical, *Employment and Earnings*. Earlier comparable unadjusted and seasonally adjusted data are published in *Employment, Hours, and Earnings, United States, 1909-84*, Bulletin 1312-12 (Bureau of Labor Statistics, 1985) and its annual supplement. For a detailed discussion of the methodology of the survey, see *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 2. For additional data, see *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985).

A comprehensive discussion of the differences between household and establishment data on employment appears in Gloria P. Green, "Comparing employment estimates from household and payroll surveys," *Monthly Labor Review*, December 1969, pp. 9-20.

### Unemployment data by State

#### Description of the series

Data presented in this section are obtained from two major sources—the Current Population Survey (CPS) and the Local Area Unemployment Statistics (LAUS) program, which is conducted in cooperation with State employment security agencies.

Monthly estimates of the labor force, employment, and unemployment for States and sub-State areas are a key indicator of local economic conditions and form the basis for determining the eligibility of an area for benefits under Federal economic assistance programs such as the Job Training Partnership Act and the Public Works and Economic Development Act. Insofar as possible, the concepts and definitions underlying these data are those used in the national estimates obtained from the CPS.

#### Notes on the data

Data refer to State of residence. Monthly data for 11 States—California, Florida, Illinois, Massachusetts, Michigan, New York, New Jersey, North Carolina, Ohio, Pennsylvania, and Texas—are obtained directly from the CPS, because the size of the sample is large enough to meet BLS standards of reliability. Data for the remaining 39 States and the District of Columbia are derived using standardized procedures established by BLS. Once a year, estimates for the 11 States are revised to new population controls. For the remaining States and the District of Columbia, data are benchmarked to annual average CPS levels.

#### Additional sources of information

Information on the concepts, definitions, and technical procedures used to develop labor force data for States and sub-State areas as well as additional data on sub-States are provided in the monthly Bureau of Labor Statistics periodical, *Employment and Earnings*, and the annual report, *Geographic Profile of Employment and Unemployment* (Bureau of Labor Statistics). See also *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 4.

labor—similar in concept to the Consumer Price Index's fixed market basket of goods and services—to measure change over time in employer costs of employing labor. The index is not seasonally adjusted.

Statistical series on total compensation costs and on wages and salaries are available for private nonfarm workers excluding proprietors, the self-employed, and household workers. Both series are also available for State and local government workers and for the civilian nonfarm economy, which consists of private industry and State and local government workers combined. Federal workers are excluded.

The Employment Cost Index probability sample consists of about 2,200 private nonfarm establishments providing about 12,000 occupational observations and 700 State and local government establishments providing

3,500 occupational observations selected to represent total employment in each sector. On average, each reporting unit provides wage and compensation information on five well-specified occupations. Data are collected each quarter for the pay period including the 12th day of March, June, September, and December.

Fixed employment weights from the 1980 Census of Population are used each quarter to calculate the indexes for civilian, private, and State and local governments. These fixed weights, also used to derive all of the industry and occupation series indexes, ensure that changes in these indexes reflect only changes in compensation, not employment shifts among industries or occupations with different levels of wages and compensation. For the bargaining status, region, and metropolitan/nonmetropolitan area series, however, employment data by industry and occupation are not available from the census. Instead, the 1980 employment weights are reallocated within these series each quarter based on the current sample. Therefore, these indexes are not strictly comparable to those for the aggregate, industry, and occupation series.

### Definitions

**Total compensation** costs include wages, salaries, and the employer's costs for employee benefits.

**Wages and salaries** consist of earnings before payroll deductions, including production bonuses, incentive earnings, commissions, and cost-of-living adjustments.

**Benefits** include the cost to employers for paid leave, supplemental pay (including nonproduction bonuses), insurance, retirement and savings plans, and legally required benefits (such as Social Security, workers' compensation, and unemployment insurance).

Excluded from wages and salaries and employee benefits are such items as payment-in-kind, free room and board, and tips.

### Notes on the data

The Employment Cost Index data series began in the fourth quarter of 1975, with the quarterly percent change in wages and salaries in the private nonfarm sector. Data on employer costs for employee benefits were included in 1980 to produce, when combined with the wages and salaries series, a measure of the percent change in employer costs for employee total compensation. State and local government units were added to the ECI coverage in 1981, providing a measure of total compensation change in the *civilian* nonfarm economy (excluding Federal employees). Historical indexes (June 1981=100) of the quarterly rates of change are presented in the May issue of the BLS monthly periodical, *Current Wage Developments*.

### Additional sources of information

For a more detailed discussion of the Employment Cost Index, see the *Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 11, and the following *Monthly Labor Review* articles: "Employment Cost Index: a measure of change in the 'price of labor'," July 1975; "How benefits will be incorporated into the Employment Cost Index," January 1978; "Estimation procedures for the Employment Cost Index," May 1982; and "Introducing new weights for the Employment Cost Index," June 1985.

Data on the ECI are also available in BLS quarterly press releases issued in the month following the reference months of March, June, September, and December; and from the *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985).

## Collective bargaining settlements

### Description of the series

**Collective bargaining settlements** data provide statistical measures of negotiated adjustments (increases, decreases, and freezes) in compensation

(wage and benefit costs) and wages alone, quarterly for private industry and semiannually for State and local government. Compensation measures cover all collective bargaining situations involving 5,000 workers or more and wage measures cover all situations involving 1,000 workers or more. These data, covering private nonagricultural industries and State and local governments, are calculated using information obtained from bargaining agreements on file with the Bureau, parties to the agreements, and secondary sources, such as newspaper accounts. The data are not seasonally adjusted.

Settlement data are measured in terms of future specified adjustments: those that will occur within 12 months after contract ratification—first-year—and all adjustments that will occur over the life of the contract expressed as an average annual rate. Adjustments are worker weighted. Both first-year and over-the-life measures exclude wage changes that may occur under cost-of-living clauses that are triggered by future movements in the Consumer Price Index.

**Effective wage adjustments** measure all adjustments occurring in the reference period, regardless of the settlement date. Included are changes from settlements reached during the period, changes deferred from contracts negotiated in earlier periods, and changes under cost-of-living adjustment clauses. Each wage change is worker weighted. The changes are prorated over all workers under agreements during the reference period yielding the average adjustment.

### Definitions

**Wage rate changes** are calculated by dividing newly negotiated wages by the average hourly earnings, excluding overtime, at the time the agreement is reached. Compensation changes are calculated by dividing the change in the value of the newly negotiated wage and benefit package by existing average hourly compensation, which includes the cost of previously negotiated benefits, legally required social insurance programs, and average hourly earnings.

**Compensation changes** are calculated by placing a value on the benefit portion of the settlements at the time they are reached. The cost estimates are based on the assumption that conditions existing at the time of settlement (for example, methods of financing pensions or composition of labor force) will remain constant. The data, therefore, are measures of negotiated changes and not of total changes in employer cost.

**Contract duration** runs from the effective date of the agreement to the expiration date or first wage reopening date, if applicable. Average annual percent changes over the contract term take account of the compounding of successive changes.

### Notes on the data

Care should be exercised in comparing the size and nature of the settlements in State and local government with those in the private sector because of differences in bargaining practices and settlement characteristics. A principal difference is the incidence of cost-of-living adjustment (COLA) clauses which cover only about 2 percent of workers under a few local government settlements, but cover 50 percent of workers under private sector settlements. Agreements without COLA's tend to provide larger specified wage increases than those with COLA's. Another difference is that State and local government bargaining frequently excludes pension benefits which are often prescribed by law. In the private sector, in contrast, pensions are typically a bargaining issue.

### Additional sources of information

For a more detailed discussion on the series, see the *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 10. Comprehensive data are published in press releases issued quarterly (in January, April, July, and October) for private industry, and semi-



annually (in February and August) for State and local government. Historical data and additional detailed tabulations for the prior calendar year appear in the April issue of the BLS monthly periodical, *Current Wage Developments*.

## Work stoppages

### Description of the series

Data on **work stoppages** measure the number and duration of major strikes or lockouts (involving 1,000 workers or more) occurring during the month (or year), the number of workers involved, and the amount of time lost because of stoppage.

Data are largely from newspaper accounts and cover only establishments directly involved in a stoppage. They do not measure the indirect or secondary effect of stoppages on other establishments whose employees are idle owing to material shortages or lack of service.

### Definitions

**Number of stoppages:** The number of strikes and lockouts involving 1,000 workers or more and lasting a full shift or longer.

**Workers involved:** The number of workers directly involved in the stoppage.

**Number of days idle:** The aggregate number of workdays lost by workers involved in the stoppages.

**Days of idleness as a percent of estimated working time:** Aggregate workdays lost as a percent of the aggregate number of standard workdays in the period multiplied by total employment in the period.

### Notes on the data

This series is not comparable with the one terminated in 1981 that covered strikes involving six workers or more.

### Additional sources of information

Data for each calendar year are reported in a BLS press release issued in the first quarter of the following year. Monthly data appear in the BLS

monthly periodical, *Current Wage Developments*. Historical data appear in the *BLS Handbook of Labor Statistics*.

## Other compensation data

Other BLS data on pay and benefits, not included in the Current Labor Statistics section of the *Monthly Labor Review*, appear in and consist of the following:

*Industry Wage Surveys* provide data for specific occupations selected to represent an industry's wage structure and the types of activities performed by its workers. The Bureau collects information on weekly work schedules, shift operations and pay differentials, paid holiday and vacation practices, and information on incidence of health, insurance, and retirement plans. Reports are issued throughout the year as the surveys are completed. Summaries of the data and special analyses also appear in the *Monthly Labor Review*.

*Area Wage Surveys* annually provide data for selected office, clerical, professional, technical, maintenance, toolroom, powerplant, material movement, and custodial occupations common to a wide variety of industries in the areas (labor markets) surveyed. Reports are issued throughout the year as the surveys are completed. Summaries of the data and special analyses also appear in the *Review*.

*The National Survey of Professional, Administrative, Technical, and Clerical Pay* provides detailed information annually on salary levels and distributions for the types of jobs mentioned in the survey's title in private employment. Although the definitions of the jobs surveyed reflect the duties and responsibilities in private industry, they are designed to match specific pay grades of Federal white-collar employees under the General Schedule pay system. Accordingly, this survey provides the legally required information for comparing the pay of salaried employees in the Federal civil service with pay in private industry. (See Federal Pay Comparability Act of 1970, 5 U.S.C. 5305.) Data are published in a BLS news release issued in the summer and in a bulletin each fall; summaries and analytical articles also appear in the *Review*.

*Employee Benefits Survey* provides nationwide information on the incidence and characteristics of employee benefit plans in medium and large establishments in the United States, excluding Alaska and Hawaii. Data are published in an annual BLS news release and bulletin, as well as in special articles appearing in the *Review*.

## PRICE DATA (Tables 2; 30-41)

PRICE DATA are gathered by the Bureau of Labor Statistics from retail and primary markets in the United States. Price indexes are given in relation to a base period (1967 = 100, unless otherwise noted).

## Consumer Price Indexes

### Description of the series

The **Consumer Price Index (CPI)** is a measure of the average change in the prices paid by urban consumers for a fixed market basket of goods and services. The CPI is calculated monthly for two population groups, one consisting only of urban households whose primary source of income is derived from the employment of wage earners and clerical workers, and the other consisting of all urban households. The wage earner index (CPI-W) is a continuation of the historic index that was introduced well over a half-century ago for use in wage negotiations. As new uses were developed for the CPI in recent years, the need for a broader and more representative index became apparent. The all urban consumer index (CPI-U) introduced in 1978 is representative of the 1972-73 buying habits of about 80 percent of the noninstitutional population of the United States at that time, compared with 40 percent represented in the CPI-W. In addition to wage earners and clerical

workers, the CPI-U covers professional, managerial, and technical workers, the self-employed, short-term workers, the unemployed, retirees, and others not in the labor force.

The CPI is based on prices of food, clothing, shelter, fuel, drugs, transportation fares, doctors' and dentists' fees, and other goods and services that people buy for day-to-day living. The quantity and quality of these items are kept essentially unchanged between major revisions so that only price changes will be measured. All taxes directly associated with the purchase and use of items are included in the index.

Data collected from more than 24,000 retail establishments and 24,000 tenants in 85 urban areas across the country are used to develop the "U.S. city average." Separate estimates for 28 major urban centers are presented in table 31. The areas listed are as indicated in footnote 1 to the table. The area indexes measure only the average change in prices for each area since the base period, and do not indicate differences in the level of prices among cities.

### Notes on the data

In January 1983, the Bureau changed the way in which homeownership costs are measured for the CPI-U. A rental equivalence method replaced the

asset-price approach to homeownership costs for that series. In January 1985, the same change was made in the CPI-w. The central purpose of the change was to separate shelter costs from the investment component of homeownership so that the index would reflect only the cost of shelter services provided by owner-occupied homes.

### Additional sources of information

For a discussion of the general method for computing the CPI, see *BLS Handbook of Methods, Volume II, The Consumer Price Index*, Bulletin 2134-2 (Bureau of Labor Statistics, 1984). The recent change in the measurement of homeownership costs is discussed in Robert Gillingham and Walter Lane, "Changing the treatment of shelter costs for homeowners in the CPI," *Monthly Labor Review*, June 1982, pp. 9-14.

Additional detailed CPI data and regular analyses of consumer price changes are provided in the *CPI Detailed Report*, a monthly publication of the Bureau. Historical data for the overall CPI and for selected groupings may be found in the *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985).

## Producer Price Indexes

### Description of the series

**Producer Price Indexes** (PPI) measure average changes in prices received in primary markets of the United States by producers of commodities in all stages of processing. The sample used for calculating these indexes currently contains about 3,200 commodities and about 60,000 quotations per month selected to represent the movement of prices of all commodities produced in the manufacturing, agriculture, forestry, fishing, mining, gas and electricity, and public utilities sectors. The stage of processing structure of Producer Price Indexes organizes products by class of buyer and degree of fabrication (that is, finished goods, intermediate goods, and crude materials). The traditional commodity structure of PPI organizes products by similarity of end use or material composition.

To the extent possible, prices used in calculating Producer Price Indexes apply to the first significant commercial transaction in the United States from the production or central marketing point. Price data are generally collected monthly, primarily by mail questionnaire. Most prices are obtained directly from producing companies on a voluntary and confidential basis. Prices generally are reported for the Tuesday of the week containing the 13th day of the month.

Since January 1976, price changes for the various commodities have been averaged together with implicit quantity weights representing their importance in the total net selling value of all commodities as of 1972. The detailed data are aggregated to obtain indexes for stage-of-processing groupings, commodity groupings, durability-of-product groupings, and a number of special composite groups. All Producer Price Index data are subject to revision 4 months after original publication.

### Notes on the data

Beginning with the January 1986 issue, the *Review* is no longer presenting tables of Producer Price Indexes for commodity groupings, special composite groups, or SIC industries. However, these data will continue to be presented in the Bureau's monthly publication *Producer Price Indexes*.

The Bureau has completed the first major stage of its comprehensive overhaul of the theory, methods, and procedures used to construct the Producer Price Indexes. Changes include the replacement of judgment sampling with probability sampling techniques; expansion to systematic coverage of the net output of virtually all industries in the mining and manufacturing sectors; a shift from a commodity to an industry orientation;

the exclusion of imports from, and the inclusion of exports in, the survey universe; and the respecification of commodities priced to conform to Bureau of the Census definitions. These and other changes have been phased in gradually since 1978. The result is a system of indexes that is easier to use in conjunction with data on wages, productivity, and employment and other series that are organized in terms of the Standard Industrial Classification and the Census product class designations.

### Additional sources of information

For a discussion of the methodology for computing Producer Price Indexes, see *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 7.

Additional detailed data and analyses of price changes are provided monthly in *Producer Price Indexes*. Selected historical data may be found in the *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985).

## International price indexes

### Description of the series

The BLS **International Price Program** produces quarterly export and import price indexes for nonmilitary goods traded between the United States and the rest of the world. The export price index provides a measure of price change for all products sold by U.S. residents to foreign buyers. ("Residents" is defined as in the national income accounts: it includes corporations, businesses, and individuals but does not require the organizations to be U.S. owned nor the individuals to have U.S. citizenship.) The import price index provides a measure of price change for goods purchased from other countries by U.S. residents. With publication of an all-import index in February 1983 and an all-export index in February 1984, all U.S. merchandise imports and exports now are represented in these indexes. The reference period for the indexes is 1977 = 100, unless otherwise indicated.

The product universe for both the import and export indexes includes raw materials, agricultural products, semifinished manufactures, and finished manufactures, including both capital and consumer goods. Price data for these items are collected quarterly by mail questionnaire. In nearly all cases, the data are collected directly from the exporter or importer, although in a few cases, prices are obtained from other sources.

To the extent possible, the data gathered refer to prices at the U.S. border for exports and at either the foreign border or the U.S. border for imports. For nearly all products, the prices refer to transactions completed during the first 2 weeks of the third month of each calendar quarter—March, June, September, and December. Survey respondents are asked to indicate all discounts, allowances, and rebates applicable to the reported prices, so that the price used in the calculation of the indexes is the actual price for which the product was bought or sold.

In addition to general indexes of prices for U.S. exports and imports, indexes are also published for detailed product categories of exports and imports. These categories are defined by the 4- and 5-digit level of detail of the Standard Industrial Trade Classification System (SITC). The calculation of indexes by SITC category facilitates the comparison of U.S. price trends and sector production with similar data for other countries. Detailed indexes are also computed and published on a Standard Industrial Classification (SIC-based) basis, as well as by end-use class.

### Notes on the data

The export and import price indexes are weighted indexes of the Laspeyres type. Price relatives are assigned equal importance within each weight category and are then aggregated to the SITC level. The values assigned to each weight category are based on trade value figures compiled

by the Bureau of the Census. The trade weights currently used to compute both indexes relate to 1980.

Because a price index depends on the same items being priced from period to period, it is necessary to recognize when a product's specifications or terms of transaction have been modified. For this reason, the Bureau's quarterly questionnaire requests detailed descriptions of the physical and functional characteristics of the products being priced, as well as information on the number of units bought or sold, discounts, credit terms, packaging, class of buyer or seller, and so forth. When there are changes in either the specifications or terms of transaction of a product, the dollar value of each change is deleted from the total price change to obtain the "pure" change. Once this value is determined, a linking procedure is employed which allows for the continued repricing of the item.

For the export price indexes, the preferred pricing basis is f.a.s. (free alongside ship) U.S. port of exportation. When firms report export prices f.o.b. (free on board), production point information is collected which enables the Bureau to calculate a shipment cost to the port of exportation.

## PRODUCTIVITY DATA (Tables 2; 42-47)

### U. S. productivity and related data

#### Description of the series

The productivity measures relate real physical output to real input. As such, they encompass a family of measures which include single factor input measures, such as output per unit of labor input (output per hour) or output per unit of capital input, as well as measures of multifactor productivity (output per unit of labor and capital inputs combined). The Bureau indexes show the change in output relative to changes in the various inputs. The measures cover the business, nonfarm business, manufacturing, and nonfinancial corporate sectors.

Corresponding indexes of hourly compensation, unit labor costs, unit nonlabor payments, and prices are also provided.

#### Definitions

**Output per hour of all persons** (labor productivity) is the value of goods and services in constant prices produced per hour of labor input. **Output per unit of capital services** (capital productivity) is the value of goods and services in constant dollars produced per unit of capital services input.

**Multifactor productivity** is the ratio output per unit of labor and capital inputs combined. Changes in this measure reflect changes in a number of factors which affect the production process such as changes in technology, shifts in the composition of the labor force, changes in capacity utilization, research and development, skill and efforts of the work force, management, and so forth. Changes in the output per hour measures reflect the impact of these factors as well as the substitution of capital for labor.

**Compensation per hour** is the wages and salaries of employees plus employers' contributions for social insurance and private benefit plans, and the wages, salaries, and supplementary payments for the self-employed (except for nonfinancial corporations in which there are no self-employed)—the sum divided by hours paid for. **Real compensation per hour** is compensation per hour deflated by the change in the Consumer Price Index for All Urban Consumers.

**Unit labor costs** are the labor compensation costs expended in the production of a unit of output and are derived by dividing compensation by output. **Unit nonlabor payments** include profits, depreciation, interest, and indirect taxes per unit of output. They are computed by subtracting compensation of all persons from current dollar value of output and dividing by output. **Unit nonlabor costs** contain all the components of unit nonlabor payments except unit profits.

An attempt is made to collect two prices for imports. The first is the import price f.o.b. at the foreign port of exportation, which is consistent with the basis for valuation of imports in the national accounts. The second is the import price c.i.f. (cost, insurance, and freight) at the U.S. port of importation, which also includes the other costs associated with bringing the product to the U.S. border. It does not, however, include duty charges.

#### Additional sources of information

For a discussion of the general method of computing International Price Indexes, see *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 8.

Additional detailed data and analyses of international price developments are presented in the Bureau's quarterly publication *U.S. Import and Export Price Indexes* and in occasional *Monthly Labor Review* articles prepared by BLS analysts. Selected historical data may be found in the *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985).

**Unit profits** include corporate profits and the value of inventory adjustments per unit of output.

**Hours of all persons** are the total hours paid of payroll workers, self-employed persons, and unpaid family workers.

**Capital services** is the flow of services from the capital stock used in production. It is developed from measures of the net stock of physical assets—equipment, structures, land, and inventories—weighted by rental prices for each type of asset.

**Labor and capital inputs** combined are derived by combining changes in labor and capital inputs with weights which represent each component's share of total output. The indexes for capital services and combined units of labor and capital are based on changing weights which are averages of the shares in the current and preceding year (the Tornquist index-number formula).

#### Notes on the data

Output measures for the business sector and the nonfarm business sector exclude the constant dollar value of owner-occupied housing, rest of world, households and institutions, and general government output from the constant dollar value of gross national product. The measures are derived from data supplied by the Bureau of Economic Analysis, U.S. Department of Commerce, and the Federal Reserve Board. Quarterly manufacturing output indexes are adjusted by the Bureau of Labor Statistics to annual estimates of output (gross product originating) from the Bureau of Economic Analysis. Compensation and hours data are developed from data of the Bureau of Labor Statistics and the Bureau of Economic Analysis.

The productivity and associated cost measures in tables 42-44 describe the relationship between output in real terms and the labor time and capital services involved in its production. They show the changes from period to period in the amount of goods and services produced per unit of input. Although these measures relate output to hours and capital services, they do not measure the contributions of labor, capital, or any other specific factor of production. Rather, they reflect the joint effect of many influences, including changes in technology; capital investment; level of output; utilization of capacity, energy, and materials; the organization of production; managerial skill; and the characteristics and efforts of the work force.

#### Additional sources of information

Descriptions of methodology underlying the measurement of output per hour and multifactor productivity are found in the *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 13. Historical data for selected industries are provided in the Bureau's *Handbook of Labor Statistics*, 1985, Bulletin 2217.

## INTERNATIONAL COMPARISONS

(Tables 45–47)

## Labor force and unemployment

## Description of the series

Tables 45 and 46 present comparative measures of the labor force, employment, and unemployment—approximating U.S. concepts—for the United States, Canada, Australia, Japan, and six European countries. The unemployment statistics (and, to a lesser extent, employment statistics) published by other industrial countries are not, in most cases, comparable to U.S. unemployment statistics. Therefore, the Bureau adjusts the figures for selected countries, where necessary, for all known major definitional differences. Although precise comparability may not be achieved, these adjusted figures provide a better basis for international comparisons than the figures regularly published by each country.

## Definitions

For the principal U.S. definitions of the **labor force**, **employment**, and **unemployment**, see the Notes section on EMPLOYMENT DATA: Household Survey Data.

## Notes on the data

The adjusted statistics have been adapted to the age at which compulsory schooling ends in each country, rather than to the U.S. standard of 16 years of age and over. Therefore, the adjusted statistics relate to the population age 16 and over in France, Sweden, and from 1973 onward, Great Britain; 15 and over in Canada, Australia, Japan, Germany, the Netherlands, and prior to 1973, Great Britain; and 14 and over in Italy. The institutional population is included in the denominator of the labor force participation rates and employment-population ratios for Japan and Germany; it is excluded for the United States and the other countries.

In the U.S. labor force survey, persons on layoff who are awaiting recall to their job are classified as unemployed. European and Japanese layoff practices are quite different in nature from those in the United States; therefore, strict application of the U.S. definition has not been made on this point. For further information, see *Monthly Labor Review*, December 1981, pp. 8–11.

The figures for one or more recent years for France, Germany, Great Britain, Italy, and the Netherlands are calculated using adjustment factors based on labor force surveys for earlier years and are considered preliminary. The recent-year measures for these countries are, therefore, subject to revision whenever data from more current labor force surveys become available.

## Additional sources of information

For further information, see *International Comparisons of Unemployment*, Bulletin 1979 (Bureau of Labor Statistics, 1978), Appendix B and unpublished Supplements to Appendix B available on request. The statistics are also analyzed periodically in the *Monthly Labor Review*. Additional historical data, generally beginning with 1959, are published in the *Handbook of Labor Statistics* and are available in unpublished statistical supplements to Bulletin 1979.

## Manufacturing productivity and labor costs

## Description of the series

Table 47 presents comparative measures of manufacturing labor productivity, hourly compensation costs, and unit labor costs for the United States, Canada, Japan, and nine European countries. These measures are limited to trend comparisons—that is, intercountry series of changes over time—rather than level comparisons because reliable international comparisons of the levels of manufacturing output are unavailable.

## Definitions

**Output** is constant value output (value added), generally taken from the national accounts of each country. While the national accounting methods for measuring real output differ considerably among the 12 countries, the use of different procedures does not, in itself, connote lack of comparability—rather, it reflects differences among countries in the availability and reliability of underlying data series.

**Hours** refer to all employed persons including the self-employed in the United States and Canada; to all wage and salary employees in the other countries. The U.S. hours measure is hours paid; the hours measures for the other countries are hours worked.

**Compensation (labor cost)** includes all payments in cash or kind made directly to employees plus employer expenditures for legally required insurance programs and contractual and private benefit plans. In addition, for some countries, compensation is adjusted for other significant taxes on payrolls or employment (or reduced to reflect subsidies), even if they are not for the direct benefit of workers, because such taxes are regarded as labor costs. However, compensation does not include all items of labor cost. The costs of recruitment, employee training, and plant facilities and services—such as cafeterias and medical clinics—are not covered because data are not available for most countries. Self-employed workers are included in the U.S. and Canadian compensation figures by assuming that their hourly compensation is equal to the average for wage and salary employees.

## Notes on the data

For most of the countries, the measures refer to total manufacturing as defined by the International Standard Industrial Classification. However, the measures for France (beginning 1959), Italy (beginning 1970), and the United Kingdom (beginning 1976), refer to manufacturing and mining less energy-related products and the figures for the Netherlands exclude petroleum refining from 1969 to 1976. For all countries, manufacturing includes the activities of government enterprises.

The figures for one or more recent years are generally based on current indicators of manufacturing output, employment, hours, and hourly compensation and are considered preliminary until the national accounts and other statistics used for the long-term measures become available.

## Additional sources of information

For additional information, see the *BLS Handbook of Methods*, Bulletin 2134, Vol. 1, Chapter 16 (Bureau of Labor Statistics, 1982) and periodic *Monthly Labor Review* articles. Historical data are provided in the Bureau's *Handbook of Labor Statistics*, Bulletin 2217, 1985. The statistics are issued twice per year—in a news release (generally in May) and in a *Monthly Labor Review* article (generally in December).

## OCCUPATIONAL INJURY AND ILLNESS DATA

(Table 48)

### Description of the series

The Annual Survey of Occupational Injuries and Illnesses is designed to collect data on injuries and illnesses based on records which employers in the following industries maintain under the Occupational Safety and Health Act of 1970: agriculture, forestry, and fishing; oil and gas extraction; construction; manufacturing; transportation and public utilities; wholesale and retail trade; finance, insurance, and real estate; and services. Excluded from the survey are self-employed individuals, farmers with fewer than 11 employees, employers regulated by other Federal safety and health laws, and Federal, State, and local government agencies.

Because the survey is a Federal-State cooperative program and the data must meet the needs of participating State agencies, an independent sample is selected for each State. The sample is selected to represent all private industries in the States and territories. The sample size for the survey is dependent upon (1) the characteristics for which estimates are needed; (2) the industries for which estimates are desired; (3) the characteristics of the population being sampled; (4) the target reliability of the estimates; and (5) the survey design employed.

While there are many characteristics upon which the sample design could be based, the total recorded case incidence rate is used because it is one of the most important characteristics and the least variable; therefore, it requires the smallest sample size.

The survey is based on stratified random sampling with a Neyman allocation and a ratio estimator. The characteristics used to stratify the establishments are the Standard Industrial Classification (SIC) code and size of employment.

### Definitions

**Recordable occupational injuries and illnesses** are: (1) occupational deaths, regardless of the time between injury and death, or the length of the illness; or (2) nonfatal occupational illnesses; or (3) nonfatal occupational injuries which involve one or more of the following: loss of consciousness, restriction of work or motion, transfer to another job, or medical treatment (other than first aid).

**Occupational injury** is any injury such as a cut, fracture, sprain, amputation, and so forth, which results from a work accident or from exposure involving a single incident in the work environment.

**Occupational illness** is an abnormal condition or disorder, other than one resulting from an occupational injury, caused by exposure to environmental factors associated with employment. It includes acute and chronic illnesses or disease which may be caused by inhalation, absorption, ingestion, or direct contact.

**Lost workday cases** are cases which involve days away from work, or days of restricted work activity, or both.

**Lost workday cases involving restricted work activity** are those cases which result in restricted work activity only.

**Lost workdays away from work** are the number of workdays (consecutive or not) on which the employee would have worked but could not because of occupational injury or illness.

**Lost workdays—restricted work activity** are the number of workdays (consecutive or not) on which, because of injury or illness: (1) the employee was assigned to another job on a temporary basis; or (2) the em-

ployee worked at a permanent job less than full time; or (3) the employee worked at a permanently assigned job but could not perform all duties normally connected with it.

**The number of days away from work or days of restricted work activity** does not include the day of injury or onset of illness or any days on which the employee would not have worked even though able to work.

**Incidence rates** represent the number of injuries and/or illnesses or lost workdays per 100 full-time workers.

### Notes on the data

Estimates are made for industries and employment-size classes and for severity classification: fatalities, lost workday cases, and nonfatal cases without lost workdays. Lost workday cases are separated into those where the employee would have worked but could not and those in which work activity was restricted. Estimates of the number of cases and the number of days lost are made for both categories.

Most of the estimates are in the form of incidence rates, defined as the number of injuries and illnesses, or lost workdays, per 100 full-time employees. For this purpose, 200,000 employee hours represent 100 employee years (2,000 hours per employee). Only a few of the available measures are included in the *Handbook of Labor Statistics*. Full detail is presented in the annual bulletin, *Occupational Injuries and Illnesses in the United States, by Industry*.

Comparable data for individual States are available from the BLS Office of Occupational Safety and Health Statistics.

Mining and railroad data are furnished to BLS by the Mine Safety and Health Administration and the Federal Railroad Administration, respectively. Data from these organizations are included in BLS and State publications. Federal employee experience is compiled and published by the Occupational Safety and Health Administration. Data on State and local government employees are collected by about half of the States and territories; these data are not compiled nationally.

### Additional sources of information

The Supplementary Data System provides detailed information describing various factors associated with work-related injuries and illnesses. These data are obtained from information reported by employers to State workers' compensation agencies. The Work Injury Report program examines selected types of accidents through an employee survey which focuses on the circumstances surrounding the injury. These data are not included in the *Handbook of Labor Statistics* but are available from the BLS Office of Occupational Safety and Health Statistics.

The definitions of occupational injuries and illnesses and lost workdays are from *Recordkeeping Requirements under the Occupational Safety and Health Act of 1970*. For additional data, see *Occupational Injuries and Illnesses in the United States, by Industry*, annual Bureau of Labor Statistics bulletin; *BLS Handbook of Methods*, Bulletin 2134-1 (Bureau of Labor Statistics, 1982), chapter 17; *Handbook of Labor Statistics*, Bulletin 2217 (Bureau of Labor Statistics, 1985), pp. 411-14; annual reports in the *Monthly Labor Review*; and annual U.S. Department of Labor press releases.

## 1. Labor market indicators

Selected indicators	1984	1985	1984		1985				1986	
			III	IV	I	II	III	IV	I	II
<b>Employment data</b>										
Employment status of the civilian noninstitutionalized population (household survey) <sup>1</sup>										
Labor force participation rate .....	64.4	64.8	64.4	64.5	64.8	64.7	64.7	64.9	65.1	65.3
Employment-population ratio .....	59.5	60.1	59.7	59.8	60.1	60.0	60.1	60.4	60.5	60.6
Unemployment rate .....	7.5	7.2	7.4	7.2	7.3	7.3	7.2	7.0	7.1	7.2
Men .....	7.4	7.0	7.3	7.1	7.1	7.1	7.0	6.9	6.8	7.1
16 to 24 years .....	14.4	14.1	14.5	13.8	14.1	14.2	14.0	14.0	13.3	14.5
25 years and over .....	5.7	5.3	5.5	5.4	5.4	5.4	5.3	5.2	5.3	5.4
Women .....	7.6	7.4	7.6	7.5	7.6	7.5	7.4	7.2	7.3	7.3
16 to 24 years .....	13.3	13.0	13.1	12.9	13.1	13.0	12.7	13.1	13.2	13.2
25 years and over .....	6.0	5.9	6.0	5.9	6.0	6.0	5.9	5.5	5.7	5.7
Unemployment rate, 15 weeks and over .....	2.4	2.0	2.3	2.1	2.0	2.0	2.0	1.9	1.9	1.9
Employment, nonagricultural (payroll data): <sup>1</sup>										
Total .....	94,496	97,614	94,977	95,907	96,581	97,295	97,897	98,668	99,403	99,848
Private sector .....	78,472	81,199	78,914	79,736	80,341	80,958	81,414	82,069	82,731	83,144
Goods-producing .....	24,727	24,930	24,891	24,943	24,970	24,947	24,866	24,937	25,028	24,952
Manufacturing .....	19,378	19,314	19,489	19,486	19,439	19,323	19,241	19,261	19,284	19,194
Service-producing .....	69,769	72,684	70,086	70,964	71,611	72,347	73,031	73,731	74,375	74,896
Average hours .....	35.2	34.9	35.1	35.1	35.0	34.9	34.9	34.9	34.9	34.8
Private sector .....	40.7	40.5	40.6	40.5	40.4	40.4	40.6	40.8	40.7	40.7
Overtime .....	3.4	3.3	3.3	3.4	3.3	3.2	3.3	3.5	3.4	3.4
<b>Employment Cost Index<sup>2</sup></b>										
Percent change in the ECI, compensation: <sup>3</sup>										
All workers (excluding farm, household, and Federal workers) .....	-	-	1.3	1.2	1.3	.7	1.6	.6	1.1	.7
Private industry workers .....	-	-	.8	1.3	1.2	.8	1.3	.6	1.1	.8
Goods-producing <sup>4</sup> .....	-	-	.9	1.1	1.5	.7	.6	.6	1.1	.9
Servicing-producing <sup>4</sup> .....	-	-	.7	1.4	1.0	1.0	1.8	.5	1.1	.6
State and local government workers .....	-	-	3.5	1.0	1.2	.2	3.4	.7	1.0	.6
Workers by bargaining status (private industry)										
Union .....	-	-	.7	1.1	.7	.6	.8	.5	1.0	.2
Nonunion .....	-	-	.9	1.3	1.6	1.0	1.4	.6	1.2	.9

<sup>1</sup> Quarterly data seasonally adjusted.

<sup>2</sup> Beginning June 1986, ECI measures are based on fixed employment counts from the 1980 Census of Population, rather than from the 1970 census.

<sup>3</sup> Quarterly changes calculated using the last month of each month.

<sup>4</sup> Goods-producing industries include mining, construction, and manufacturing. Service-producing industries include all other private sector industries.

## 2. Annual and quarterly percent changes in compensation, prices, and productivity

Selected measures	1984	1985	1984		1985				1986		
			III	IV	I	II	III	IV	I	II	
			<b>Compensation data:</b> <sup>1, 2</sup>								
Employment Cost Index--Compensation (wages, salaries, benefits)											
Civilian nonfarm .....	-	-	1.3	1.2	1.3	0.7	1.6	0.6	1.1	0.7	
Private nonfarm .....	-	-	.8	1.3	1.2	.8	1.3	.6	1.1	.8	
Employment Cost Index--Wages and Salaries											
Civilian nonfarm .....	-	-	1.3	1.2	1.2	.9	1.7	.6	1.0	.8	
Private nonfarm .....	-	-	.8	1.2	1.2	1.1	1.3	.6	1.0	.9	
<b>Price data</b> <sup>1</sup>											
Consumer Price Index (All urban consumers): All items .....	4.0	3.8	1.2	.3	1.0	1.1	.7	.9	-.4	.6	
Producer Price Index											
Finished goods .....	1.7	1.8	-.5	.9	.0	.7	-1.4	2.5	-3.1	.3	
Finished consumer goods .....	1.6	1.5	-.5	.8	-.3	.7	-1.4	2.5	-4.1	.2	
Capital equipment .....	1.8	2.7	-.5	1.1	1.3	.4	-1.4	2.5	.2	.5	
Intermediate materials, supplies, components .....	1.3	-.3	-.4	-.1	-.4	-.2	-.5	.4	-2.9	-.8	
Crude materials .....	-1.6	-5.6	-2.0	-1.2	-3.1	-2.1	-4.5	4.3	-7.6	-2.2	
<b>Productivity data</b> <sup>1</sup>											
Output per hour of all persons:											
Business sector .....	2.3	1.0	-.3	-.1	.9	2.7	3.4	-3.2	3.3	-.3	
Nonfarm business sector .....	-1.8	.5	-.7	-.4	.3	1.8	2.2	-3.5	4.3	-.5	
Nonfinancial corporations <sup>3</sup> .....	2.0	1.2	-1.6	1.1	.8	2.2	4.9	-2.8	-.5	-2.3	

<sup>1</sup> Annual changes are December-to-December change. Quarterly changes are calculated using the last month of each quarter. Compensation and Price data are not seasonally adjusted and the price data are not compounded. Productivity data are seasonally adjusted.

<sup>2</sup> Excludes Federal and private household workers.

<sup>3</sup> Output per hour of all employees.

- Data not available.

## 3. Alternative measures of wage and compensation changes

Components	Quarterly average								Four quarters ended--					
	1985				1986				1985				1986	
	I	II	III	IV	I	II	I	II	III	IV	I	II		
<b>Average hourly compensation:</b> <sup>1</sup>														
All persons, business sector .....	4.2	5.1	4.4	3.8	2.5	2.7	3.9	4.5	4.4	4.4	3.9	3.3		
All employees, nonfarm business sector .....	3.9	4.6	3.2	3.7	3.1	2.2	3.9	4.2	4.0	3.9	3.6	3.1		
<b>Employment Cost Index--compensation:</b>														
Civilian nonfarm <sup>2</sup> .....	1.3	.7	1.6	.6	1.1	.7	4.8	4.6	4.9	4.3	4.1	4.0		
Private nonfarm .....	1.2	.8	1.3	.6	1.1	.8	4.4	4.2	4.7	3.9	3.8	3.8		
Union .....	.7	.6	.8	.5	1.0	.2	3.5	3.1	3.2	2.6	2.9	2.5		
Nonunion .....	1.6	1.0	1.4	.6	1.2	.9	4.9	4.9	5.4	4.6	4.2	4.2		
State and local governments .....	1.2	.2	3.4	.7	1.0	.6	6.3	6.1	6.0	5.7	5.5	5.8		
<b>Employment Cost Index--wages and salaries:</b>														
Civilian nonfarm <sup>2</sup> .....	1.2	.9	1.7	.6	1.0	.8	4.4	4.5	5.0	4.4	4.2	4.1		
Private nonfarm .....	1.2	1.1	1.3	.6	1.0	.9	4.1	4.3	4.8	4.1	3.9	3.7		
Union .....	.7	1.1	.9	.5	.7	.4	3.0	3.4	3.6	3.1	3.2	2.5		
Nonunion .....	1.4	1.1	1.5	.6	1.1	.9	4.6	4.8	5.4	4.6	4.3	4.1		
State and local governments .....	1.0	.2	3.5	.8	1.0	.4	5.6	5.5	5.6	5.6	5.5	5.7		
<b>Total effective wage adjustments</b> <sup>3</sup>														
From current settlements .....	.7	.8	1.2	.5	.6	.7	3.6	3.5	3.5	3.3	3.1	2.9		
From prior settlements .....	.1	.2	.2	.1	.0	.2	.7	.9	.9	.7	.6	.5		
From cost-of-living provision .....	.6	.5	.5	.2	.4	.6	2.2	1.9	1.8	1.8	1.7	1.8		
From cost-of-living provision .....	.1	.1	.4	.1	.2	.0	.7	.7	.8	.7	.8	.7		
<b>Negotiated wage adjustments from settlements</b> <sup>3</sup>														
First-year adjustments .....	3.3	2.5	2.0	2.1	1.0	1.3	2.4	2.4	2.4	2.3	2.0	1.7		
Annual rate over life of contract .....	3.2	2.8	3.1	1.9	1.6	2.0	2.3	2.4	2.5	2.7	2.5	2.3		
<b>Negotiated wage and benefit adjustments from settlements</b> <sup>4</sup>														
First-year adjustment .....	3.6	3.5	2.0	2.0	.4	.7	3.4	3.4	3.1	2.6	2.3	1.5		
Annual rate over life of contract .....	2.7	3.4	3.0	1.4	1.3	1.6	2.6	2.7	2.7	2.7	2.6	2.0		

<sup>1</sup> Seasonally adjusted.

<sup>2</sup> Excludes Federal and household workers. Beginning June 1986, ECI measures are based on fixed employment counts from the 1980 Census of Population, rather than from the 1970 census.

<sup>3</sup> Limited to major collective bargaining units of 1,000 workers or more. The most recent data are preliminary.

<sup>4</sup> Limited to major collective bargaining units of 5,000 workers or more. The most recent data are preliminary.

4. Employment status of the total population, by sex, monthly data seasonally adjusted

(Numbers in thousands)

Employment status	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>TOTAL</b>															
Noninstitutional population <sup>1, 2</sup> .....	178,080	179,912	180,131	180,304	180,470	180,642	180,810	181,361	181,512	181,678	181,843	181,998	182,183	182,354	182,525
Labor force <sup>2</sup> .....	115,241	117,167	117,069	117,522	117,814	117,832	117,927	118,477	118,779	118,900	118,929	119,351	119,796	119,744	119,879
Participation rate <sup>3</sup> .....	64.7	65.1	65.0	65.2	65.3	65.2	65.2	65.3	65.4	65.4	65.4	65.6	65.8	65.7	65.7
Total employed <sup>2</sup> .....	106,702	108,856	108,936	109,251	109,513	109,671	109,904	110,646	110,252	110,481	110,587	110,797	111,353	111,554	111,852
Employment-population ratio <sup>4</sup> .....	59.9	60.5	60.5	60.6	60.7	60.7	60.8	61.0	60.7	60.8	60.8	60.9	61.1	61.2	61.3
Resident Armed Forces <sup>1</sup> .....	1,697	1,706	1,726	1,732	1,700	1,702	1,698	1,691	1,691	1,693	1,695	1,687	1,680	1,672	1,697
Civilian employed .....	105,005	107,150	107,210	107,519	107,813	107,969	108,206	108,955	108,561	108,788	108,892	109,110	109,673	109,882	110,155
Agriculture .....	3,321	3,179	3,095	3,017	3,058	3,070	3,151	3,299	3,096	3,285	3,222	3,160	3,165	3,112	3,048
Nonagricultural industries .....	101,685	103,971	104,115	104,502	104,755	104,899	105,055	105,655	105,465	105,503	105,670	105,950	106,508	106,769	107,107
Unemployed .....	8,539	8,312	8,133	8,271	8,301	8,161	8,023	7,831	8,527	8,419	8,342	8,554	8,443	8,190	8,027
Unemployment rate <sup>5</sup> .....	7.4	7.1	6.9	7.0	7.0	6.9	6.8	6.6	7.2	7.1	7.0	7.2	7.0	6.8	6.7
Not in labor force .....	62,839	62,744	63,062	62,782	62,656	62,810	62,883	62,885	62,733	62,778	62,914	62,647	62,387	62,610	62,646
<b>Men, 16 years and over</b>															
Noninstitutional population <sup>1, 2</sup> .....	85,156	86,025	86,132	86,217	86,293	86,374	86,459	86,882	86,954	87,035	87,120	87,195	87,288	87,373	87,460
Labor force <sup>2</sup> .....	65,386	65,967	65,945	66,074	66,227	66,176	66,139	66,679	66,838	66,864	66,757	66,943	66,964	66,936	66,944
Participation rate <sup>3</sup> .....	76.8	76.7	76.6	76.6	76.7	76.6	76.5	76.7	76.9	76.8	76.6	76.8	76.7	76.6	76.5
Total employed <sup>2</sup> .....	60,642	61,447	61,510	61,629	61,656	61,731	61,793	62,458	62,243	62,288	62,254	62,190	62,322	62,365	62,515
Employment-population ratio <sup>4</sup> .....	71.2	71.4	71.4	71.5	71.4	71.5	71.5	71.9	71.6	71.6	71.5	71.3	71.4	71.4	71.5
Resident Armed Forces <sup>1</sup> .....	1,551	1,556	1,574	1,580	1,551	1,552	1,549	1,539	1,539	1,540	1,541	1,533	1,525	1,518	1,541
Civilian employed .....	59,091	59,891	59,936	60,049	60,105	60,179	60,244	60,919	60,704	60,748	60,713	60,657	60,797	60,847	60,974
Unemployed .....	4,744	4,521	4,435	4,445	4,571	4,445	4,346	4,221	4,595	4,577	4,503	4,754	4,642	4,571	4,429
Unemployment rate <sup>5</sup> .....	7.3	6.9	6.7	6.7	6.9	6.7	6.6	6.3	6.9	6.8	6.7	7.1	6.9	6.8	6.6
<b>Women, 16 years and over</b>															
Noninstitutional population <sup>1, 2</sup> .....	92,924	93,886	93,999	94,087	94,177	94,266	94,351	94,479	94,558	94,643	94,723	94,803	94,895	94,981	95,065
Labor force <sup>2</sup> .....	49,855	51,200	51,124	51,448	51,587	51,655	51,788	51,797	51,941	52,036	52,172	52,408	52,832	52,808	52,935
Participation rate <sup>3</sup> .....	53.7	54.5	54.4	54.7	54.8	54.8	54.9	54.8	54.9	55.0	55.1	55.3	55.7	55.6	55.7
Total employed <sup>2</sup> .....	46,061	47,409	47,426	47,622	47,857	47,939	48,111	48,187	48,009	48,194	48,333	48,608	49,031	49,189	49,337
Employment-population ratio <sup>4</sup> .....	49.6	50.5	50.5	50.6	50.8	50.9	51.0	51.0	50.8	50.9	51.0	51.3	51.7	51.8	51.9
Resident Armed Forces <sup>1</sup> .....	146	150	152	152	149	149	149	152	152	153	154	154	155	154	156
Civilian employed .....	45,915	47,259	47,274	47,470	47,708	47,790	47,962	48,035	47,857	48,041	48,179	48,454	48,876	49,035	49,181
Unemployed .....	3,794	3,791	3,698	3,826	3,730	3,716	3,677	3,610	3,932	3,842	3,839	3,800	3,801	3,619	3,598
Unemployment rate <sup>5</sup> .....	7.6	7.4	7.2	7.4	7.2	7.2	7.1	7.0	7.6	7.4	7.4	7.3	7.2	6.9	6.8

<sup>1</sup> The population and Armed Forces figures are not adjusted for seasonal variation.

<sup>2</sup> Includes members of the Armed Forces stationed in the United States.

<sup>3</sup> Labor force as a percent of the noninstitutional population.

<sup>4</sup> Total employed as a percent of the noninstitutional population.

<sup>5</sup> Unemployment as a percent of the labor force (including the resident Armed Forces).



### 5. Employment status of the civilian population, by sex, age, race and Hispanic origin, monthly data seasonally adjusted

(Numbers in thousands)

Employment status	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>TOTAL</b>															
Civilian noninstitutional population <sup>1</sup>	176,383	178,206	178,405	178,572	178,770	178,940	179,112	179,670	179,821	179,985	180,148	180,311	180,503	180,682	180,828
Civilian labor force	113,544	115,461	115,343	115,790	116,114	116,130	116,229	116,786	117,088	117,207	117,234	117,664	118,116	118,072	118,182
Participation rate	64.4	64.8	64.7	64.8	65.0	64.9	64.9	65.0	65.1	65.1	65.1	65.3	65.4	65.3	65.4
Employed	105,005	107,150	107,210	107,519	107,813	107,969	108,206	108,955	108,561	108,788	108,892	109,110	109,673	109,882	110,155
Employment-population ratio <sup>2</sup>	59.5	60.1	60.1	60.2	60.3	60.3	60.4	60.6	60.4	60.4	60.4	60.5	60.8	60.8	60.9
Unemployed	8,539	8,312	8,133	8,271	8,301	8,161	8,023	7,831	8,527	8,419	8,342	8,554	8,443	8,190	8,027
Unemployment rate	7.5	7.2	7.1	7.1	7.1	7.0	6.9	6.7	7.3	7.2	7.1	7.3	7.1	6.9	6.8
Not in labor force	62,839	62,744	63,062	62,782	62,656	62,810	62,883	62,885	62,733	62,778	62,914	62,647	62,387	62,610	62,646
<b>Men, 20 years and over</b>															
Civilian noninstitutional population <sup>1</sup>	76,219	77,195	77,306	77,389	77,498	77,566	77,651	78,101	78,171	78,236	78,309	78,387	78,484	78,586	78,634
Civilian labor force	59,701	60,277	60,269	60,407	60,526	60,553	60,548	61,212	61,183	61,268	61,053	61,208	61,387	61,323	61,235
Participation rate	78.3	78.1	78.0	78.1	78.1	78.1	78.0	78.4	78.3	78.3	78.0	78.1	78.2	78.0	77.9
Employed	55,769	56,562	56,636	56,751	56,849	56,897	56,982	57,706	57,384	57,459	57,391	57,312	57,560	57,499	57,607
Employment-population ratio <sup>2</sup>	73.2	73.3	73.3	73.3	73.4	73.4	73.4	73.9	73.4	73.4	73.3	73.1	73.3	73.2	73.3
Agriculture	2,418	2,278	2,231	2,171	2,188	2,210	2,278	2,349	2,258	2,411	2,347	2,278	2,320	2,266	2,173
Nonagricultural industries	53,351	54,284	54,405	54,580	54,661	54,687	54,704	55,356	55,127	55,048	55,043	55,034	55,241	55,233	55,435
Unemployed	3,932	3,715	3,633	3,656	3,677	3,656	3,566	3,507	3,799	3,809	3,663	3,897	3,827	3,824	3,628
Unemployment rate	6.6	6.2	6.0	6.1	6.1	6.0	5.9	5.7	6.2	6.2	6.0	6.4	6.2	6.2	5.9
<b>Women, 20 years and over</b>															
Civilian noninstitutional population <sup>1</sup>	85,429	86,506	86,652	86,727	86,810	86,901	86,988	87,112	87,185	87,263	87,355	87,444	87,547	87,629	87,689
Civilian labor force	45,900	47,283	47,340	47,558	47,663	47,713	47,870	47,895	47,921	47,952	48,107	48,409	48,805	48,916	48,989
Participation rate	53.7	54.7	54.6	54.8	54.9	54.9	55.0	55.0	55.0	55.0	55.1	55.4	55.7	55.8	55.9
Employed	42,793	44,154	44,197	44,363	44,609	44,656	44,882	44,980	44,710	44,797	45,009	45,284	45,701	45,918	45,999
Employment-population ratio <sup>2</sup>	50.1	51.0	51.0	51.2	51.4	51.4	51.6	51.6	51.3	51.3	51.5	51.8	52.2	52.4	52.5
Agriculture	595	596	581	557	609	591	597	696	593	598	576	609	565	608	627
Nonagricultural industries	42,198	43,558	43,616	43,806	44,000	44,065	44,285	44,284	44,117	44,199	44,433	44,675	45,136	45,309	45,372
Unemployed	3,107	3,129	3,143	3,195	3,054	3,057	2,988	2,915	3,211	3,155	3,097	3,125	3,104	2,998	2,990
Unemployment rate	6.8	6.6	6.6	6.7	6.4	6.4	6.2	6.1	6.7	6.6	6.4	6.5	6.4	6.1	6.1
<b>Both sexes, 16 to 19 years</b>															
Civilian noninstitutional population <sup>1</sup>	14,735	14,506	14,448	14,456	14,463	14,472	14,474	14,458	14,465	14,485	14,484	14,480	14,472	14,467	14,505
Civilian labor force	7,943	7,901	7,734	7,825	7,925	7,864	7,811	7,678	7,984	7,987	8,074	8,047	7,923	7,833	7,958
Participation rate	53.9	54.5	53.5	54.1	54.8	54.3	54.0	53.1	55.2	55.1	55.7	55.6	54.7	54.1	54.9
Employed	6,444	6,434	6,377	6,405	6,355	6,416	6,342	6,269	6,467	6,532	6,492	6,515	6,411	6,465	6,549
Employment-population ratio <sup>2</sup>	43.7	44.4	44.1	44.3	43.9	44.3	43.8	43.4	44.7	45.1	44.8	45.0	44.3	44.7	45.2
Agriculture	309	305	283	289	261	269	276	254	246	276	298	274	280	238	249
Nonagricultural industries	6,135	6,129	6,094	6,116	6,094	6,147	6,066	6,015	6,221	6,256	6,194	6,241	6,131	6,227	6,300
Unemployed	1,499	1,468	1,357	1,420	1,570	1,448	1,469	1,409	1,517	1,455	1,582	1,532	1,512	1,368	1,409
Unemployment rate	18.9	18.6	17.5	18.1	19.8	18.4	18.8	18.4	19.0	18.2	19.6	19.0	19.1	17.5	17.7
<b>White</b>															
Civilian noninstitutional population <sup>1</sup>	152,347	153,679	153,819	153,938	154,082	154,203	154,327	154,784	154,889	155,005	155,122	155,236	155,376	155,502	155,604
Civilian labor force	98,492	99,926	99,817	100,179	100,533	100,478	100,533	100,961	101,232	101,248	101,249	101,515	101,975	101,922	102,189
Participation rate	64.6	65.0	64.9	65.1	65.2	65.2	65.1	65.2	65.4	65.3	65.3	65.4	65.6	65.5	65.7
Employed	92,120	93,736	93,684	94,055	94,369	94,507	94,585	95,165	94,803	94,958	95,081	95,180	95,731	95,760	96,271
Employment-population ratio <sup>2</sup>	60.5	61.0	60.9	61.1	61.2	61.3	61.3	61.5	61.2	61.3	61.3	61.3	61.6	61.6	61.9
Unemployed	6,372	6,191	6,133	6,124	6,164	5,971	5,948	5,796	6,429	6,290	6,168	6,335	6,244	6,162	5,918
Unemployment rate	6.5	6.2	6.1	6.1	6.1	5.9	5.9	5.7	6.4	6.2	6.1	6.2	6.1	6.0	5.8
<b>Black</b>															
Civilian noninstitutional population <sup>1</sup>	19,348	19,664	19,700	19,728	19,761	19,790	19,819	19,837	19,863	19,889	19,916	19,943	19,974	20,002	20,028
Civilian labor force	12,033	12,364	12,289	12,378	12,412	12,457	12,522	12,548	12,545	12,656	12,740	12,781	12,754	12,601	12,473
Participation rate	62.2	62.9	62.4	62.7	62.8	62.9	63.2	63.3	63.2	63.6	64.0	64.1	63.9	63.0	62.3
Employed	10,119	10,501	10,560	10,500	10,566	10,518	10,657	10,737	10,690	10,791	10,856	10,889	10,825	10,836	10,654
Employment-population ratio <sup>2</sup>	52.3	53.4	53.6	53.2	53.5	53.1	53.8	54.1	53.8	54.3	54.5	54.6	54.2	54.2	53.2
Unemployed	1,914	1,864	1,729	1,878	1,846	1,939	1,865	1,810	1,855	1,865	1,884	1,892	1,929	1,766	1,819
Unemployment rate	15.9	15.1	14.1	15.2	14.9	15.6	14.9	14.4	14.8	14.7	14.8	14.8	15.1	14.0	14.6

See footnotes at end of table.

5. Continued— Employment status of the civilian population, by sex, age, race and Hispanic origin, monthly data seasonally adjusted

(Numbers in thousands)

Employment status	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>Hispanic origin</b>															
Civilian noninstitutional population <sup>1</sup> .....	11,478	11,915	11,969	12,004	12,040	12,075	12,111	12,148	12,184	12,219	12,255	12,290	12,326	12,362	12,397
Civilian labor force .....	7,451	7,698	7,781	7,844	7,854	7,782	7,772	7,787	7,943	7,920	7,975	8,002	8,110	8,123	8,102
Participation rate .....	64.9	64.6	65.0	65.3	65.2	64.4	64.2	64.1	65.2	64.8	65.1	65.1	65.8	65.7	65.4
Employed .....	6,651	6,888	6,973	7,026	6,982	6,953	6,962	6,998	6,969	7,105	7,144	7,123	7,251	7,274	7,213
Employment-population ratio <sup>2</sup> .....	57.9	57.8	58.3	58.5	58.0	57.6	57.5	57.6	57.2	58.2	58.3	58.0	58.8	58.8	58.2
Unemployed .....	800	811	808	818	872	829	810	789	974	815	832	878	858	849	889
Unemployment rate .....	10.7	10.5	10.4	10.4	11.1	10.7	10.4	10.1	12.3	10.3	10.4	11.0	10.6	10.5	11.0

<sup>1</sup> The population figures are not seasonally adjusted.

<sup>2</sup> Civilian employment as a percent of the civilian noninstitutional population.

because data for the "other races" groups are not presented and Hispanics are included in both the white and black population groups.

NOTE: Detail for the above race and Hispanic-origin groups will not sum to totals

6. Selected employment indicators, monthly data seasonally adjusted

(In thousands)

Selected categories	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>CHARACTERISTIC</b>															
Civilian employed, 16 years and over .....	105,005	107,150	107,210	107,519	107,813	107,969	108,206	108,955	108,561	108,788	108,892	109,110	109,673	109,882	110,155
Men .....	59,091	59,891	59,936	60,049	60,105	60,179	60,244	60,919	60,704	60,748	60,713	60,657	60,797	60,847	60,974
Women .....	45,915	47,259	47,274	47,470	47,708	47,790	47,962	48,035	47,857	48,041	48,179	48,454	48,876	49,035	49,181
Married men, spouse present ..	39,056	39,248	39,142	39,103	39,272	39,314	39,278	39,615	39,382	39,365	39,555	39,614	39,626	39,611	39,716
Married women, spouse present .....	25,636	26,336	26,392	26,531	26,702	26,721	26,804	26,958	26,593	26,656	26,802	26,920	27,427	27,523	27,438
Women who maintain families ..	5,465	5,597	5,627	5,556	5,514	5,605	5,693	5,702	5,733	5,771	5,812	5,718	5,668	5,829	5,826
<b>MAJOR INDUSTRY AND CLASS OF WORKER</b>															
Agriculture:															
Wage and salary workers .....	1,555	1,535	1,456	1,438	1,465	1,537	1,572	1,673	1,519	1,689	1,587	1,480	1,498	1,486	1,469
Self-employed workers .....	1,553	1,458	1,444	1,414	1,436	1,361	1,409	1,492	1,444	1,453	1,475	1,486	1,504	1,427	1,379
Unpaid family workers .....	213	185	176	179	172	158	164	163	156	172	180	186	154	171	178
Nonagricultural industries:															
Wage and salary workers .....	93,565	95,871	95,791	96,546	96,530	96,676	96,921	97,911	97,516	97,698	97,831	97,994	98,372	98,206	98,667
Government .....	15,770	16,031	16,075	16,145	16,213	16,157	16,194	16,418	16,104	16,095	16,187	16,325	16,387	16,647	16,479
Private industries .....	77,794	79,841	79,716	80,401	80,317	80,519	80,727	81,494	81,412	81,604	81,643	81,669	81,984	81,559	82,188
Private households .....	1,238	1,249	1,295	1,266	1,271	1,197	1,131	1,256	1,197	1,213	1,321	1,275	1,279	1,243	1,261
Other .....	76,556	78,592	78,421	79,135	79,046	79,322	79,596	80,238	80,216	80,390	80,322	80,394	80,705	80,317	80,927
Self-employed workers .....	7,785	7,811	7,874	7,846	7,991	8,013	7,903	7,655	7,669	7,644	7,571	7,757	7,807	8,081	7,982
Unpaid family workers .....	335	289	303	266	248	249	250	273	270	240	253	229	235	254	282
<b>PERSONS AT WORK PART TIME<sup>1</sup></b>															
All industries:															
Part time for economic reasons ..	5,744	5,590	5,680	5,554	5,475	5,498	5,494	5,543	5,377	5,538	5,923	5,980	5,537	5,399	5,443
Slack work .....	2,430	2,430	2,480	2,433	2,251	2,306	2,303	2,364	2,369	2,330	2,603	2,659	2,434	2,484	2,411
Could only find part-time work ..	2,948	2,819	2,835	2,815	2,897	2,883	2,864	2,883	2,703	2,953	2,974	2,893	2,810	2,624	2,711
Voluntary part time .....	13,169	13,489	13,622	13,496	13,713	13,645	13,556	13,958	13,817	13,754	13,933	13,638	14,268	13,991	14,023
Nonagricultural industries:															
Part time for economic reasons ..	5,512	5,334	5,413	5,299	5,241	5,295	5,294	5,275	5,158	5,301	5,621	5,673	5,320	5,191	5,259
Slack work .....	2,291	2,273	2,319	2,292	2,115	2,196	2,195	2,208	2,224	2,159	2,430	2,523	2,308	2,323	2,286
Could only find part-time work ..	2,866	2,730	2,740	2,730	2,801	2,784	2,760	2,776	2,636	2,861	2,849	2,790	2,724	2,579	2,660
Voluntary part time .....	12,704	13,038	13,179	13,053	13,277	13,194	13,122	13,441	13,369	13,285	13,599	13,191	13,779	13,656	13,683

<sup>1</sup> Excludes persons "with a job but not at work" during the survey period for such

reasons as vacation, illness, or industrial disputes.

## 7. Selected unemployment indicators, monthly data seasonally adjusted

(Unemployment rates)

Selected categories	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>CHARACTERISTIC</b>															
Total, all civilian workers .....	7.5	7.2	7.1	7.1	7.1	7.0	6.9	6.7	7.3	7.2	7.1	7.3	7.1	6.9	6.8
Both sexes, 16 to 19 years .....	18.9	18.6	17.5	18.1	19.8	18.4	18.8	18.4	19.0	18.2	19.6	19.0	19.1	17.5	17.7
Men, 20 years and over .....	6.6	6.2	6.0	6.1	6.1	6.0	5.9	5.7	6.2	6.2	6.0	6.4	6.2	6.2	5.9
Women, 20 years and over .....	6.8	6.6	6.6	6.7	6.4	6.4	6.2	6.1	6.7	6.6	6.4	6.5	6.4	6.1	6.1
White, total .....	6.5	6.2	6.1	6.1	6.1	5.9	5.9	5.7	6.4	6.2	6.1	6.2	6.1	6.0	5.8
Both sexes, 16 to 19 years .....	16.0	15.7	15.2	15.3	17.0	15.5	15.9	14.9	16.2	14.5	16.4	16.0	16.2	15.0	15.2
Men, 16 to 19 years .....	16.8	16.5	17.2	16.2	18.5	15.8	16.2	14.7	16.5	15.3	17.2	17.3	17.8	15.3	16.7
Women, 16 to 19 years .....	15.2	14.8	13.0	14.4	15.3	15.1	15.5	15.1	15.8	13.7	15.6	14.7	14.4	14.7	13.5
Men, 20 years and over .....	5.7	5.4	5.3	5.2	5.2	5.2	5.1	5.0	5.4	5.5	5.2	5.5	5.4	5.5	5.0
Women, 20 years and over .....	5.8	5.7	5.7	5.7	5.5	5.4	5.4	5.3	5.9	5.8	5.5	5.5	5.4	5.3	5.2
Black, total .....	15.9	15.1	14.1	15.2	14.9	15.6	14.9	14.4	14.8	14.7	14.8	14.8	15.1	14.0	14.6
Both sexes, 16 to 19 years .....	42.7	40.2	35.3	38.8	39.7	40.8	41.6	41.9	39.1	43.7	42.6	40.8	40.2	38.6	39.5
Men, 16 to 19 years .....	42.7	41.0	34.9	41.1	41.0	45.2	41.0	41.3	38.7	44.1	41.4	40.8	38.5	41.6	37.4
Women, 16 to 19 years .....	42.6	39.2	35.9	36.1	38.2	36.0	42.3	42.4	39.5	43.4	43.7	40.8	41.9	35.1	41.8
Men, 20 years and over .....	14.3	13.2	11.9	13.3	13.7	13.7	13.1	12.7	13.3	12.6	12.6	12.7	13.3	12.7	13.2
Women, 20 years and over .....	13.5	13.1	13.1	13.5	12.1	13.6	12.6	12.0	12.5	12.2	12.5	12.8	12.8	11.9	12.5
Hispanic origin, total .....	10.7	10.5	10.4	10.4	11.1	10.7	10.4	10.1	12.3	10.3	10.4	11.0	10.6	10.5	11.0
Married men, spouse present .....	4.6	4.3	4.1	4.3	4.2	4.3	4.3	4.3	4.5	4.5	4.2	4.5	4.5	4.4	4.1
Married women, spouse present .....	5.7	5.6	5.4	5.6	5.3	5.5	5.3	5.1	5.5	5.6	5.3	5.4	5.2	5.3	5.1
Women who maintain families .....	10.3	10.4	10.8	11.3	10.4	10.0	9.4	9.9	9.9	10.1	9.4	10.2	10.1	9.2	10.3
Full-time workers .....	7.2	6.8	6.8	6.8	6.8	6.7	6.6	6.4	6.9	6.9	6.7	7.0	6.7	6.6	6.4
Part-time workers .....	9.3	9.3	9.0	9.3	9.6	8.8	9.0	8.4	9.4	9.1	9.6	9.2	9.1	9.0	9.3
Unemployed 15 weeks and over .....	2.4	2.0	2.0	2.0	2.0	1.9	1.9	1.8	2.0	1.9	1.8	1.9	2.0	1.9	1.9
Labor force time lost <sup>1</sup> .....	8.6	8.1	8.1	8.1	7.9	7.9	7.8	7.6	8.1	8.1	8.1	8.3	8.1	7.7	7.7
<b>INDUSTRY</b>															
Nonagricultural private wage and salary workers .....	7.4	7.2	7.1	7.2	7.1	7.0	6.9	6.7	7.2	7.2	7.2	7.3	7.1	7.2	6.9
Mining .....	10.0	9.5	8.6	8.9	7.7	7.3	10.3	10.9	9.2	10.4	12.8	13.7	17.6	17.0	16.7
Construction .....	14.3	13.1	13.1	13.6	13.5	13.4	12.6	12.9	13.2	13.0	12.0	13.3	12.1	13.2	12.2
Manufacturing .....	7.5	7.7	7.8	7.7	7.5	7.7	7.3	7.0	7.2	7.2	6.8	7.5	7.3	6.9	6.8
Durable goods .....	7.2	7.6	7.9	7.7	7.3	7.6	7.3	7.0	7.4	6.8	6.8	7.3	7.1	6.7	6.9
Nondurable goods .....	7.8	7.8	7.6	7.8	7.8	7.8	7.3	7.1	7.0	7.7	6.8	7.7	7.5	7.2	6.7
Transportation and public utilities .....	5.5	5.1	4.5	5.3	5.1	5.1	5.0	4.3	5.3	6.1	5.6	5.3	5.5	6.1	4.6
Wholesale and retail trade .....	8.0	7.6	7.7	7.8	7.7	7.5	7.6	7.2	7.8	7.6	8.1	8.1	7.7	7.8	7.4
Finance and service industries .....	5.9	5.6	5.5	5.5	5.4	5.4	5.3	5.2	5.9	5.7	5.9	5.5	5.4	5.7	5.7
Government workers .....	4.5	3.9	3.9	3.8	3.9	3.6	3.8	3.4	3.8	4.0	3.5	3.7	3.6	3.2	3.2
Agricultural wage and salary workers .....	13.5	13.2	14.0	13.3	12.9	12.5	10.6	10.9	14.3	11.9	13.4	15.8	13.2	11.6	13.8

<sup>1</sup> Aggregate hours lost by the unemployed and persons on part time for economic reasons as a percent of potentially available labor force hours.

8. Unemployment rates by sex and age, monthly data seasonally adjusted

(Civilian workers)

Sex and age	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
Total, 16 years and over .....	7.5	7.2	7.1	7.1	7.1	7.0	6.9	6.7	7.3	7.2	7.1	7.3	7.1	6.9	6.8
16 to 24 years .....	13.9	13.6	13.0	13.3	13.9	13.5	13.3	13.0	13.6	13.2	13.9	14.2	13.5	13.0	12.8
16 to 19 years .....	18.9	18.6	17.5	18.1	19.8	18.4	18.8	18.4	19.0	18.2	19.6	19.0	19.1	17.5	17.7
16 to 17 years .....	21.2	21.0	19.1	20.3	22.7	21.4	21.1	20.9	21.8	19.4	20.9	21.1	20.6	19.4	19.6
18 to 19 years .....	17.4	17.0	16.8	16.7	17.8	16.9	17.5	16.4	17.2	17.1	18.9	17.5	17.9	15.7	16.6
20 to 24 years .....	11.5	11.1	10.8	10.9	10.9	11.0	10.6	10.4	10.8	10.6	10.9	11.7	10.7	10.8	10.2
25 years and over .....	5.8	5.6	5.5	5.6	5.4	5.4	5.3	5.1	5.7	5.7	5.4	5.5	5.6	5.4	5.3
25 to 54 years .....	6.1	5.8	5.8	5.8	5.7	5.6	5.5	5.4	5.9	5.9	5.8	5.9	5.9	5.8	5.6
55 years and over .....	4.5	4.1	4.1	4.1	3.9	3.8	3.9	3.9	4.4	4.3	3.9	3.6	3.7	3.8	3.7
Men, 16 years and over .....	7.4	7.0	6.9	6.9	7.1	6.9	6.7	6.5	7.0	7.0	6.9	7.3	7.1	7.0	6.8
16 to 24 years .....	14.4	14.1	13.8	13.8	14.6	13.9	13.5	12.8	13.6	13.6	14.5	15.0	14.0	13.5	13.3
16 to 19 years .....	19.6	19.5	19.6	19.3	21.5	19.4	19.3	18.2	19.3	18.9	20.2	20.4	20.1	18.2	19.2
16 to 17 years .....	21.9	21.9	21.9	20.7	24.0	20.9	21.6	20.9	23.2	20.0	21.2	21.6	19.4	20.0	21.0
18 to 19 years .....	18.3	17.9	18.1	18.3	19.9	18.7	18.0	16.2	16.6	17.8	19.7	19.6	20.4	16.1	18.1
20 to 24 years .....	11.9	11.4	10.9	11.0	11.1	11.2	10.6	10.3	10.7	11.0	11.6	12.2	11.0	11.2	10.3
25 years and over .....	5.7	5.3	5.3	5.3	5.3	5.2	5.1	5.0	5.5	5.5	5.2	5.4	5.5	5.5	5.3
25 to 54 years .....	5.9	5.6	5.6	5.5	5.5	5.4	5.4	5.3	5.7	5.7	5.5	5.8	5.8	5.8	5.5
55 years and over .....	4.6	4.1	3.8	4.0	4.1	4.0	3.9	3.9	4.4	4.3	3.9	3.8	4.1	3.9	4.1
Women, 16 years and over .....	7.6	7.4	7.3	7.5	7.3	7.2	7.1	7.0	7.6	7.4	7.4	7.3	7.2	6.9	6.8
16 to 24 years .....	13.3	13.0	12.2	12.9	13.1	13.1	13.2	13.2	13.6	12.7	13.2	13.3	13.0	12.5	12.1
16 to 19 years .....	18.0	17.6	15.3	16.9	17.9	17.4	18.3	18.5	18.6	17.5	19.0	17.6	18.0	16.6	16.0
16 to 17 years .....	20.4	20.0	15.8	19.8	21.2	22.0	20.6	20.8	20.2	18.7	20.5	20.5	21.9	18.7	18.1
18 to 19 years .....	16.6	16.0	15.3	14.9	15.5	15.1	16.9	16.5	17.7	16.3	18.1	15.3	15.1	15.3	15.0
20 to 24 years .....	10.9	10.7	10.7	10.9	10.7	10.8	10.6	10.5	11.0	10.1	10.0	11.1	10.4	10.4	10.1
25 years and over .....	6.0	5.9	5.8	6.0	5.6	5.6	5.4	5.3	5.9	5.9	5.8	5.7	5.7	5.4	5.4
25 to 54 years .....	6.3	6.2	6.1	6.2	5.9	5.9	5.7	5.6	6.2	6.3	6.2	6.1	6.1	5.7	5.8
55 years and over .....	4.2	4.1	4.5	4.2	3.7	3.6	3.9	3.8	4.4	4.4	3.8	3.4	3.1	3.6	3.1

9. Unemployed persons by reason for unemployment, monthly data seasonally adjusted

(Numbers in thousands)

Reason for unemployment	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
Job losers .....	4,421	4,139	4,144	4,142	4,040	4,081	3,933	3,776	4,162	4,246	4,034	4,311	4,335	3,937	3,831
On layoff .....	1,171	1,157	1,112	1,167	1,161	1,175	1,132	1,163	1,152	1,164	1,028	1,133	1,066	1,079	990
Other job losers .....	3,250	2,982	3,032	2,975	2,879	2,906	2,801	2,613	3,010	3,082	3,006	3,178	3,269	2,858	2,841
Job leavers .....	823	877	875	852	911	808	876	996	1,001	1,002	1,110	975	1,013	1,034	978
Reentrants .....	2,184	2,256	2,191	2,335	2,237	2,226	2,225	2,066	2,292	2,197	2,191	2,217	2,064	2,223	2,232
New entrants .....	1,110	1,039	941	918	1,045	1,055	1,033	1,025	1,097	1,000	1,059	1,062	1,059	965	1,000
<b>PERCENT OF UNEMPLOYED</b>															
Job losers .....	51.8	49.8	50.8	50.2	49.1	50.0	48.8	48.0	48.7	50.3	48.1	50.3	51.2	48.3	47.6
On layoff .....	13.7	13.9	13.6	14.2	14.1	14.4	14.0	14.8	13.5	13.8	12.2	13.2	12.6	13.2	12.3
Other job losers .....	38.1	35.9	37.2	36.1	35.0	35.6	34.7	33.2	35.2	36.5	35.8	37.1	38.6	35.0	35.3
Job leavers .....	9.6	10.6	10.7	10.3	11.1	9.9	10.9	12.7	11.7	11.9	13.2	11.4	12.0	12.7	12.2
Reentrants .....	25.6	27.1	26.9	28.3	27.2	27.2	27.6	26.3	26.8	26.0	26.1	25.9	24.4	27.2	27.8
New entrants .....	13.0	12.5	11.5	11.1	12.7	12.9	12.8	13.0	12.8	11.8	12.6	12.4	12.5	11.8	12.4
<b>PERCENT OF CIVILIAN LABOR FORCE</b>															
Job losers .....	3.9	3.6	3.6	3.6	3.5	3.5	3.4	3.2	3.6	3.6	3.4	3.7	3.7	3.3	3.2
Job leavers .....	.7	.8	.8	.7	.8	.7	.8	.9	.9	.9	.9	.8	.9	.9	.8
Reentrants .....	1.9	2.0	1.9	2.0	1.9	1.9	1.9	1.8	2.0	1.9	1.9	1.9	1.7	1.9	1.9
New entrants .....	1.0	.9	.8	.8	.9	.9	.9	.9	.9	.9	.9	.9	.9	.8	.8

10. Duration of unemployment, monthly data seasonally adjusted

(Numbers in thousands)

Weeks of unemployment	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
Less than 5 weeks .....	3,350	3,498	3,422	3,484	3,430	3,465	3,374	3,311	3,562	3,589	3,628	3,705	3,384	3,394	3,427
5 to 14 weeks .....	2,451	2,509	2,508	2,505	2,536	2,448	2,460	2,441	2,622	2,640	2,685	2,737	2,708	2,486	2,379
15 weeks and over .....	2,737	2,305	2,274	2,307	2,277	2,205	2,188	2,056	2,340	2,258	2,135	2,209	2,320	2,256	2,295
15 to 26 weeks .....	1,104	1,025	1,047	1,035	1,057	894	973	969	1,149	1,099	1,001	1,072	1,036	1,066	1,086
27 weeks and over .....	1,634	1,280	1,227	1,272	1,220	1,311	1,215	1,087	1,191	1,159	1,134	1,137	1,284	1,190	1,209
Mean duration in weeks .....	18.2	15.6	15.5	15.5	15.4	15.7	15.4	14.9	15.3	14.4	14.3	14.4	15.2	15.0	15.8
Median duration in weeks .....	7.9	6.8	7.2	6.9	7.0	6.9	6.9	6.8	6.9	6.8	6.5	6.6	7.3	7.1	7.2

### 11. Unemployment rates of civilian workers by State, data not seasonally adjusted

State	July 1985	July 1986	State	July 1985	July 1986
Alabama	9.0	10.5	Montana	6.8	7.3
Alaska	8.5	10.6	Nebraska	5.3	4.4
Arizona	7.6	7.4	Nevada	7.7	5.6
Arkansas	8.4	8.9	New Hampshire	5.1	3.7
California	7.7	7.5	New Jersey	6.0	5.7
Colorado	5.6	6.8	New Mexico	9.2	9.5
Connecticut	5.3	4.1	New York	6.1	6.3
Delaware	5.2	5.8	North Carolina	5.6	5.1
District of Columbia	8.4	8.2	North Dakota	5.3	6.1
Florida	7.0	6.9	Ohio	9.3	7.8
Georgia	7.0	6.5	Oklahoma	7.2	8.8
Hawaii	5.9	4.9	Oregon	8.6	8.9
Idaho	8.1	7.7	Pennsylvania	7.8	6.7
Illinois	8.9	7.8	Rhode Island	5.7	4.0
Indiana	7.5	6.6	South Carolina	7.3	6.7
Iowa	7.7	6.8	South Dakota	5.1	4.1
Kansas	4.8	5.3	Tennessee	8.4	8.5
Kentucky	9.3	9.3	Texas	7.7	9.3
Louisiana	12.0	12.8	Utah	5.5	5.6
Maine	6.0	5.6	Vermont	4.5	3.9
Maryland	4.4	4.2	Virginia	6.0	4.7
Massachusetts	4.3	3.8	Washington	7.7	8.1
Michigan	10.8	9.2	West Virginia	12.5	11.9
Minnesota	5.6	4.9	Wisconsin	6.7	6.5
Mississippi	11.0	13.0	Wyoming	6.5	9.0
Missouri	6.1	6.2			

- Data not available.

NOTE: Some data in this table may differ from data

published elsewhere because of the continual updating of the database.

### 12. Employment of workers on nonagricultural payrolls by State, data not seasonally adjusted

(In thousands)

State	July 1985	June 1986	July 1986 <sup>P</sup>	State	July 1985	June 1986	July 1986 <sup>P</sup>
Alabama	1,431.9	1,443.9	1,448.5	Nebraska	649.2	660.8	653.9
Alaska	249.3	234.0	244.8	Nevada	448.6	465.4	467.7
Arizona	1,261.3	1,333.7	1,333.2	New Hampshire	470.9	494.7	491.7
Arkansas	800.0	819.8	816.7	New Jersey	3,467.0	3,566.2	3,569.3
California	10,950.7	11,234.3	11,160.2	New Mexico	516.5	524.4	520.2
Colorado	1,415.4	1,457.2	1,441.5	New York	7,784.4	7,959.3	7,925.6
Connecticut	1,564.0	1,622.6	1,605.5	North Carolina	2,604.2	2,733.2	2,681.7
Delaware	298.9	300.8	298.6	North Dakota	253.1	252.2	249.3
District of Columbia	646.3	649.9	669.2	Ohio	4,383.5	4,549.1	4,515.1
Florida	4,369.7	4,547.0	4,504.0	Oklahoma	1,176.8	1,163.4	1,143.7
Georgia	2,573.6	2,640.2	2,634.3	Oregon	1,023.8	1,067.1	1,043.8
Hawaii	423.9	430.4	431.3	Pennsylvania	4,748.2	4,847.7	4,813.0
Idaho	338.9	338.2	335.3	Rhode Island	423.7	431.4	424.7
Illinois	4,782.1	4,798.5	4,808.3	South Carolina	1,296.2	1,350.4	1,334.9
Indiana	2,176.2	2,255.7	2,254.0	South Dakota	249.4	257.1	251.3
Iowa	1,070.4	1,080.9	1,062.7	Tennessee	1,862.0	1,930.8	1,924.9
Kansas	970.9	994.8	981.9	Texas	6,684.5	6,674.2	6,666.6
Kentucky	1,239.8	1,280.5	1,263.1	Utah	621.8	636.4	634.0
Louisiana	1,589.6	1,524.1	1,506.1	Vermont	220.8	227.5	223.4
Maine	469.5	481.8	477.9	Virginia	2,443.1	2,559.3	2,534.9
Maryland	1,913.4	1,950.9	1,951.8	Washington	1,710.6	1,775.1	1,760.6
Massachusetts	2,916.5	2,999.6	2,964.6	West Virginia	605.2	600.7	603.7
Michigan	3,494.7	3,597.1	3,557.2	Wisconsin	1,982.3	2,040.9	2,023.7
Minnesota	1,869.6	1,919.1	1,899.9	Wyoming	213.1	205.5	203.0
Mississippi	834.6	848.0	840.5	Puerto Rico	674.0	704.9	700.9
Missouri	2,100.0	2,157.9	2,154.6	Virgin Islands	37.3	36.4	37.3
Montana	280.3	284.0	274.0				

<sup>P</sup> = preliminary

NOTE: Some data in this table may differ from data published elsewhere

because of the continual updating of the database.

13. Employment of workers on nonagricultural payrolls by industry, monthly data seasonally adjusted

(In thousands)

Industry	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July <sup>P</sup>	Aug. <sup>P</sup>
<b>TOTAL</b> .....	94,496	97,614	97,890	98,128	98,428	98,666	98,910	99,296	99,429	99,484	99,783	99,918	99,843	100,122	100,324
<b>PRIVATE SECTOR</b> .....	78,472	81,199	81,428	81,592	81,853	82,073	82,281	82,659	82,748	82,785	83,072	83,198	83,161	83,502	83,676
<b>GOODS PRODUCING</b> .....	24,727	24,930	24,880	24,843	24,903	24,931	24,977	25,101	25,038	24,945	25,038	24,965	24,854	24,861	24,923
<b>Mining</b> .....	966	930	922	917	913	907	901	897	880	852	821	790	772	764	752
Oil and gas extraction .....	607	585	581	577	571	565	560	556	541	518	488	461	446	438	429
<b>Construction</b> .....	4,383	4,687	4,702	4,728	4,754	4,765	4,787	4,901	4,864	4,838	4,972	4,974	4,947	4,981	5,036
General building contractors .....	1,161	1,251	1,257	1,267	1,276	1,283	1,287	1,330	1,320	1,298	1,315	1,314	1,299	1,299	1,306
<b>Manufacturing</b> .....	19,378	19,314	19,256	19,198	19,236	19,259	19,289	19,303	19,294	19,255	19,245	19,201	19,135	19,116	19,135
Production workers .....	13,285	13,130	13,078	13,029	13,059	13,074	13,100	13,111	13,097	13,061	13,060	13,025	12,979	12,963	12,984
<b>Durable goods</b> .....	11,505	11,516	11,473	11,421	11,447	11,453	11,461	11,466	11,455	11,418	11,415	11,378	11,307	11,294	11,295
Production workers .....	7,739	7,660	7,619	7,572	7,594	7,594	7,595	7,595	7,579	7,545	7,547	7,519	7,462	7,447	7,451
Lumber and wood products .....	704	700	700	702	705	708	710	716	716	715	719	719	721	720	725
Furniture and fixtures .....	487	493	495	491	493	493	494	494	494	493	494	496	496	498	497
Stone, clay, and glass products .....	593	591	591	590	591	591	593	596	597	594	600	599	597	592	594
Primary metal industries .....	857	813	798	795	797	801	803	798	795	787	785	780	761	756	733
Blast furnaces and basic steel products .....	334	305	302	304	304	302	303	300	299	293	291	288	286	283	261
Fabricated metal products .....	1,463	1,468	1,463	1,459	1,460	1,459	1,456	1,455	1,452	1,450	1,451	1,447	1,440	1,429	1,432
Machinery, except electrical .....	2,198	2,182	2,164	2,147	2,146	2,139	2,133	2,137	2,127	2,118	2,111	2,100	2,089	2,081	2,079
Electrical and electronic equipment .....	2,208	2,207	2,195	2,179	2,181	2,179	2,182	2,182	2,181	2,177	2,177	2,175	2,143	2,169	2,165
Transportation equipment .....	1,901	1,971	1,977	1,970	1,987	1,993	1,998	1,996	1,998	1,986	1,986	1,972	1,974	1,975	1,985
Motor vehicles and equipment .....	862	876	876	871	873	870	872	867	864	858	854	839	839	830	832
Instruments and related products .....	714	723	724	723	722	723	725	724	725	726	723	721	717	711	717
Miscellaneous manufacturing industries .....	382	369	366	365	365	367	367	368	370	369	369	369	369	363	368
<b>Nondurable goods</b> .....	7,873	7,798	7,783	7,777	7,789	7,806	7,828	7,837	7,839	7,837	7,830	7,823	7,828	7,822	7,840
Production workers .....	5,546	5,470	5,459	5,457	5,465	5,480	5,505	5,516	5,518	5,516	5,513	5,506	5,517	5,516	5,533
Food and kindred products .....	1,612	1,608	1,608	1,607	1,610	1,612	1,623	1,623	1,631	1,632	1,633	1,640	1,648	1,646	1,649
Tobacco manufactures .....	64	65	64	65	64	65	64	64	63	63	63	62	62	62	59
Textile mill products .....	746	704	698	697	699	701	702	702	705	707	703	705	707	710	713
Apparel and other textile products .....	1,185	1,125	1,117	1,121	1,121	1,122	1,130	1,133	1,122	1,117	1,119	1,113	1,106	1,106	1,106
Paper and allied products .....	681	683	682	682	683	687	686	687	687	688	689	689	690	687	687
Printing and publishing .....	1,376	1,435	1,442	1,442	1,447	1,454	1,457	1,461	1,467	1,469	1,472	1,474	1,477	1,481	1,478
Chemicals and allied products .....	1,049	1,046	1,043	1,042	1,040	1,037	1,035	1,034	1,032	1,031	1,028	1,024	1,026	1,026	1,034
Petroleum and coal products .....	189	178	177	171	171	170	169	168	167	166	166	166	164	162	163
Rubber and misc. plastics products .....	780	790	787	785	790	794	798	802	803	804	800	796	797	791	796
Leather and leather products .....	189	166	165	165	164	164	164	163	162	160	157	154	151	151	155
<b>SERVICE-PRODUCING</b> .....	69,769	72,684	73,010	73,285	73,525	73,735	73,933	74,195	74,391	74,539	74,745	74,953	74,989	75,261	75,401
<b>Transportation and public utilities</b> .....	5,159	5,242	5,219	5,257	5,260	5,272	5,277	5,286	5,277	5,280	5,266	5,265	5,167	5,276	5,236
Transportation .....	2,917	3,006	2,983	3,023	3,026	3,040	3,046	3,056	3,048	3,053	3,040	3,037	3,035	3,057	3,055
Communication and public utilities .....	2,242	2,236	2,236	2,234	2,234	2,232	2,231	2,230	2,229	2,227	2,226	2,228	2,132	2,219	2,181
<b>Wholesale trade</b> .....	5,555	5,740	5,762	5,777	5,796	5,796	5,809	5,830	5,843	5,841	5,864	5,872	5,829	5,851	5,866
Durable goods .....	3,276	3,409	3,424	3,432	3,442	3,451	3,460	3,470	3,482	3,480	3,485	3,488	3,454	3,484	3,493
Nondurable goods .....	2,279	2,331	2,338	2,345	2,354	2,345	2,349	2,360	2,361	2,361	2,379	2,384	2,375	2,367	2,373
<b>Retail trade</b> .....	16,545	17,360	17,464	17,489	17,543	17,589	17,622	17,734	17,795	17,828	17,851	17,911	17,944	17,997	18,027
General merchandise stores .....	2,267	2,320	2,328	2,326	2,329	2,326	2,317	2,328	2,333	2,333	2,342	2,344	2,350	2,356	2,358
Food stores .....	2,637	2,779	2,805	2,813	2,828	2,845	2,870	2,880	2,891	2,901	2,910	2,917	2,932	2,938	2,947
Automotive dealers and service stations .....	1,799	1,892	1,904	1,910	1,916	1,918	1,922	1,929	1,938	1,939	1,940	1,944	1,945	1,950	1,957
Eating and drinking places .....	5,388	5,715	5,749	5,761	5,772	5,783	5,801	5,831	5,854	5,868	5,859	5,889	5,918	5,932	5,941
<b>Finance, insurance, and real estate</b> .....	5,689	5,953	5,988	6,014	6,038	6,070	6,095	6,123	6,157	6,184	6,228	6,261	6,295	6,335	6,376
Finance .....	2,854	2,979	2,998	3,011	3,024	3,039	3,053	3,066	3,082	3,095	3,120	3,137	3,159	3,178	3,201
Insurance .....	1,757	1,830	1,839	1,846	1,852	1,862	1,868	1,878	1,889	1,900	1,910	1,918	1,927	1,945	1,955
Real estate .....	1,078	1,144	1,151	1,157	1,162	1,169	1,174	1,179	1,186	1,189	1,198	1,206	1,209	1,212	1,220
<b>Services</b> .....	20,797	21,974	22,115	22,212	22,313	22,415	22,501	22,585	22,638	22,707	22,825	22,924	23,072	23,182	23,248
Business services .....	4,057	4,452	4,504	4,542	4,567	4,604	4,631	4,660	4,687	4,698	4,750	4,755	4,792	4,837	4,843
Health services .....	6,122	6,310	6,333	6,350	6,375	6,401	6,424	6,447	6,471	6,497	6,511	6,543	6,571	6,598	6,638
<b>Government</b> .....	16,024	16,415	16,462	16,536	16,575	16,593	16,629	16,637	16,681	16,699	16,711	16,720	16,682	16,620	16,648
<b>Federal</b> .....	2,807	2,875	2,886	2,899	2,895	2,904	2,913	2,918	2,918	2,923	2,914	2,899	2,875	2,868	2,878
State .....	3,734	3,848	3,855	3,878	3,895	3,901	3,904	3,916	3,924	3,927	3,938	3,936	3,927	3,932	3,943
Local .....	9,482	9,692	9,721	9,759	9,785	9,788	9,812	9,803	9,839	9,849	9,859	9,885	9,880	9,820	9,827

<sup>P</sup> = preliminary

NOTE: See notes on the data for a description of the most recent benchmark

revision.

**14. Average weekly hours of production or nonsupervisory workers on private nonagricultural payrolls by industry, monthly data seasonally adjusted**

Industry	Annual average		1985						1986						
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July <sup>P</sup>	Aug. <sup>P</sup>
<b>PRIVATE SECTOR</b> .....	35.2	34.9	34.9	34.9	34.9	34.8	34.9	35.0	34.9	34.9	34.8	34.8	34.7	34.7	34.8
<b>CONSTRUCTION</b> .....	37.8	37.7	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>MANUFACTURING</b> .....	40.7	40.5	40.6	40.7	40.7	40.7	40.9	40.8	40.7	40.7	40.7	40.7	40.6	40.6	40.8
Overtime hours .....	3.4	3.3	3.3	3.3	3.4	3.4	3.6	3.5	3.4	3.4	3.4	3.4	3.3	3.5	3.5
<b>Durable goods</b> .....	41.4	41.2	41.3	41.3	41.3	41.3	41.6	41.5	41.4	41.4	41.3	41.2	41.2	41.2	41.4
Overtime hours .....	3.6	3.5	3.4	3.5	3.5	3.6	3.7	3.6	3.5	3.6	3.6	3.4	3.5	3.5	3.6
Lumber and wood products .....	39.9	39.9	40.1	40.1	40.2	39.9	40.2	40.4	40.0	40.2	40.3	40.3	39.9	40.0	40.0
Furniture and fixtures .....	39.7	39.4	39.3	39.4	39.5	39.4	39.9	40.0	39.7	39.4	39.1	39.4	39.4	39.4	39.7
Stone, clay, and glass products .....	42.0	41.9	42.0	42.0	42.1	41.8	41.8	42.7	41.9	41.9	42.4	42.3	42.2	42.2	42.5
Primary metal industries .....	41.7	41.5	41.7	41.5	41.8	41.9	42.1	41.9	42.1	41.9	41.3	41.7	41.6	41.3	42.1
Blast furnaces and basic steel products .....	40.7	41.1	41.5	41.1	41.6	41.9	41.9	41.7	41.8	41.7	40.5	41.5	41.1	41.3	42.1
Fabricated metal products .....	41.4	41.3	41.4	41.5	41.5	41.5	41.6	41.5	41.5	41.4	41.2	41.1	41.1	41.0	41.2
Machinery except electrical .....	41.9	41.5	41.6	41.6	41.5	41.6	41.7	41.6	41.6	41.6	41.8	41.8	41.7	41.5	41.0
Electrical and electronic equipment .....	41.0	40.6	40.7	40.5	40.6	40.9	41.1	41.0	40.9	41.0	41.1	41.0	41.0	41.3	41.4
Transportation equipment .....	42.7	42.6	42.9	42.9	42.8	42.7	43.0	42.8	42.7	42.7	42.1	41.9	42.2	42.1	43.1
Motor vehicles and equipment .....	43.8	43.5	43.7	43.6	43.7	43.6	44.0	43.6	43.4	43.3	41.9	41.8	42.4	42.3	43.6
Instruments and related products .....	41.3	41.0	40.9	40.9	40.9	41.0	41.6	41.1	41.2	41.3	41.3	40.9	41.0	40.7	40.8
Miscellaneous manufacturing .....	39.4	39.4	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>Nondurable goods</b> .....	39.7	39.6	39.6	39.8	39.8	39.8	40.0	39.9	39.7	39.8	39.9	39.9	39.8	39.8	40.0
Overtime hours .....	3.1	3.1	3.1	3.1	3.2	3.2	3.4	3.3	3.2	3.2	3.3	3.4	3.2	3.4	3.4
Food and kindred products .....	39.8	40.0	40.0	40.1	40.2	40.0	40.1	40.1	39.8	39.9	40.2	40.2	40.0	40.1	40.5
Tobacco manufactures .....	38.9	37.2	-	-	-	-	-	-	-	-	-	-	-	-	-
Textile mill products .....	39.9	39.7	40.0	40.5	40.7	40.8	41.0	40.8	40.6	40.7	41.3	41.1	40.8	40.9	41.4
Apparel and other textile products .....	36.4	36.4	36.4	36.6	36.6	36.8	36.8	36.7	36.3	36.5	36.9	36.5	36.5	36.7	36.4
Paper and allied products .....	43.1	43.1	43.1	43.1	43.2	43.3	43.5	43.6	43.5	43.5	43.0	43.2	43.1	43.3	43.7
Printing and publishing .....	37.9	37.8	37.9	37.9	37.9	37.9	38.1	38.0	38.0	38.0	38.0	38.0	37.8	37.8	37.8
Chemicals and allied products .....	41.9	41.9	41.9	41.7	41.8	41.9	42.0	41.9	41.8	41.9	41.9	42.0	41.9	41.9	42.0
Petroleum and coal products .....	43.7	43.0	43.3	43.3	44.2	43.2	43.6	43.5	43.7	43.8	43.6	43.4	44.0	43.3	43.5
Leather and leather products .....	36.8	37.2	-	-	-	-	-	-	-	-	-	-	-	-	-
<b>TRANSPORTATION AND PUBLIC UTILITIES</b> .....	39.4	39.5	39.5	39.5	39.5	39.4	39.5	39.4	39.5	39.6	39.2	39.2	39.1	39.2	39.3
<b>WHOLESALE TRADE</b> .....	38.5	38.4	38.4	38.4	38.4	38.4	38.4	38.5	38.4	38.5	38.5	38.4	38.3	38.3	38.4
<b>RETAIL TRADE</b> .....	29.8	29.4	29.4	29.4	29.3	29.3	29.2	29.3	29.3	29.3	29.2	29.2	29.1	29.2	29.2
<b>SERVICES</b> .....	32.6	32.5	32.5	32.4	32.5	32.4	32.5	32.6	32.6	32.5	32.5	32.5	32.4	32.4	32.5

- Data not available.  
P = preliminary

NOTE: See "Notes on the data" for a description of the most recent benchmark adjustment.

## 15. Average hourly earnings of production or nonsupervisory workers on private nonagricultural payrolls by industry

Industry	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July <sup>P</sup>	Aug. <sup>P</sup>
<b>PRIVATE SECTOR</b> .....	\$8.32	\$8.57	\$8.52	\$8.67	\$8.64	\$8.66	\$8.71	\$8.72	\$8.74	\$8.73	\$8.72	\$8.72	\$8.71	\$8.69	\$8.69
Seasonally adjusted .....	-	-	8.59	8.62	8.63	8.65	8.70	8.68	8.71	8.73	8.72	8.73	8.74	8.72	8.76
<b>MINING</b> .....	11.63	11.98	11.99	12.05	12.00	12.07	12.27	12.24	12.32	12.35	12.43	12.44	12.50	12.46	12.47
<b>CONSTRUCTION</b> .....	12.13	12.31	12.28	12.46	12.42	12.28	12.47	12.34	12.35	12.22	12.29	12.33	12.31	12.31	12.42
<b>MANUFACTURING</b> .....	9.19	9.53	9.49	9.57	9.56	9.63	9.74	9.70	9.70	9.72	9.70	9.71	9.70	9.73	9.68
<b>Durable goods</b> .....	9.74	10.10	10.06	10.15	10.15	10.22	10.34	10.27	10.29	10.30	10.28	10.28	10.26	10.27	10.22
Lumber and wood products .....	8.03	8.22	8.27	8.33	8.30	8.29	8.35	8.30	8.36	8.33	8.32	8.37	8.43	8.35	8.40
Furniture and fixtures .....	6.84	7.17	7.20	7.27	7.29	7.32	7.38	7.36	7.31	7.35	7.36	7.39	7.46	7.44	7.47
Stone, clay, and glass products .....	9.57	9.84	9.87	9.91	9.87	9.91	9.95	9.96	9.94	9.93	10.00	10.04	10.04	10.06	10.07
Primary metal industries .....	11.47	11.68	11.63	11.69	11.61	11.77	11.84	11.81	11.96	11.99	12.00	12.02	11.94	12.07	11.81
Blast furnaces and basic steel products .....	12.98	13.34	13.36	13.43	13.32	13.43	13.44	13.48	13.81	13.80	13.82	13.86	13.88	14.10	13.85
Fabricated metal products .....	9.40	9.70	9.64	9.74	9.71	9.76	9.91	9.85	9.85	9.88	9.84	9.85	9.88	9.85	9.82
Machinery, except electrical .....	9.96	10.29	10.26	10.38	10.41	10.48	10.55	10.50	10.53	10.58	10.55	10.55	10.55	10.56	10.54
Electrical and electronic equipment .....	9.04	9.47	9.50	9.54	9.55	9.61	9.68	9.60	9.60	9.62	9.62	9.64	9.61	9.68	9.66
Transportation equipment .....	12.20	12.72	12.65	12.78	12.78	12.85	13.06	12.91	12.87	12.90	12.83	12.79	12.27	12.74	12.74
Motor vehicles and equipment .....	12.73	13.42	13.31	13.48	13.44	13.52	13.81	13.66	13.59	13.66	13.54	13.47	13.41	13.36	13.35
Instruments and related products .....	8.84	9.16	9.19	9.25	9.24	9.27	9.39	9.32	9.39	9.41	9.41	9.40	9.41	9.48	9.46
Miscellaneous manufacturing .....	7.05	7.30	7.28	7.33	7.32	7.37	7.48	7.48	7.50	7.51	7.50	7.54	7.54	7.58	7.52
<b>Nondurable goods</b> .....	8.38	8.71	8.70	8.73	8.72	8.79	8.87	8.86	8.86	8.88	8.88	8.90	8.91	8.99	8.94
Food and kindred products .....	8.39	8.57	8.50	8.53	8.51	8.61	8.71	8.72	8.71	8.74	8.75	8.78	8.74	8.75	8.66
Tobacco manufactures .....	11.22	11.94	12.34	11.34	11.31	11.97	11.78	11.89	12.38	12.76	12.84	13.38	13.68	13.49	13.38
Textile mill products .....	6.46	6.71	6.72	6.75	6.76	6.79	6.83	6.85	6.83	6.86	6.87	6.88	6.87	6.89	6.96
Apparel and other textile products .....	5.55	5.73	5.69	5.75	5.74	5.75	5.80	5.82	5.79	5.80	5.81	5.78	5.79	5.75	5.81
Paper and allied products .....	10.41	10.82	10.86	10.91	10.91	10.97	11.07	11.02	10.99	11.03	11.05	11.12	11.15	11.29	11.21
Printing and publishing .....	9.41	9.71	9.76	9.81	9.78	9.83	9.92	9.85	9.86	9.90	9.87	9.91	9.88	9.97	10.03
Chemicals and allied products .....	11.07	11.56	11.60	11.65	11.70	11.80	11.85	11.86	11.81	11.78	11.82	11.89	11.94	12.05	11.99
Petroleum and coal products .....	13.44	14.06	14.02	14.09	13.99	14.07	14.24	14.26	14.21	14.22	14.16	14.02	14.14	14.15	14.19
Rubber and miscellaneous plastics products .....	8.29	8.54	8.52	8.56	8.54	8.63	8.73	8.69	8.69	8.72	8.68	8.75	8.75	8.80	8.82
Leather and leather products .....	5.71	5.82	5.81	5.83	5.77	5.83	5.83	5.86	5.83	5.86	5.89	5.88	5.88	5.88	5.88
<b>TRANSPORTATION AND PUBLIC UTILITIES</b> .....	11.12	11.40	11.42	11.54	11.48	11.59	11.61	11.59	11.64	11.62	11.55	11.54	11.57	11.60	11.56
<b>WHOLESALE TRADE</b> .....	8.89	9.16	9.12	9.22	9.16	9.23	9.33	9.28	9.36	9.33	9.29	9.29	9.32	9.30	9.31
<b>RETAIL TRADE</b> .....	5.85	5.94	5.88	5.98	5.95	5.97	5.99	6.03	6.04	6.03	6.01	6.00	5.99	5.97	5.95
<b>FINANCE, INSURANCE, AND REAL ESTATE</b> .....	7.63	7.94	7.91	8.04	8.01	8.06	8.15	8.14	8.28	8.30	8.29	8.31	8.37	8.31	8.32
<b>SERVICES</b> .....	7.59	7.89	7.82	7.99	7.99	8.05	8.12	8.12	8.17	8.18	8.12	8.10	8.10	8.03	8.04

- Data not available.  
P = preliminary

NOTE: See "Notes on the data" for a description of the most recent benchmark revision.



16. Average weekly earnings of production or nonsupervisory workers on private nonagricultural payrolls by industry

Industry	Annual average		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July <sup>P</sup>	Aug. <sup>P</sup>
<b>PRIVATE SECTOR</b>															
Current dollars .....	\$292.86	\$299.09	\$299.90	\$303.45	\$301.54	\$301.37	\$306.59	\$302.58	\$300.66	\$302.93	\$301.71	\$302.58	\$303.98	\$304.15	\$305.02
Seasonally adjusted .....	-	-	299.79	300.84	301.19	301.02	303.63	303.80	303.98	304.68	303.46	303.80	303.28	302.58	304.85
Constant (1977) dollars .....	172.78	170.42	170.30	171.83	170.36	169.59	172.05	169.32	168.82	171.05	170.94	170.85	170.78	170.97	-
<b>MINING</b> .....	503.58	519.93	519.17	526.59	518.40	521.42	537.43	543.46	522.37	522.41	522.06	519.99	525.00	517.09	520.00
<b>CONSTRUCTION</b> .....	458.51	464.09	471.55	479.71	475.69	450.68	460.14	459.05	434.72	444.81	462.10	467.31	465.32	470.24	475.69
<b>MANUFACTURING</b>															
Current dollars .....	374.03	385.97	384.35	390.46	390.05	393.87	406.16	394.79	390.91	395.60	392.85	394.23	395.76	391.15	393.98
Constant (1977) dollars .....	220.67	219.93	218.26	221.10	220.37	221.65	227.92	220.92	219.49	223.38	222.58	222.60	222.34	219.87	-
<b>Durable goods</b> .....	403.24	416.12	412.46	420.21	419.20	424.13	439.45	425.18	421.89	426.42	423.54	423.54	424.76	417.99	420.04
Lumber and wood products .....	320.40	327.98	334.94	338.20	335.32	327.46	335.67	329.51	328.55	333.20	334.46	338.99	342.26	333.17	339.36
Furniture and fixtures .....	271.55	282.50	283.68	289.35	291.60	291.34	303.32	289.98	284.36	288.12	286.30	288.21	294.67	287.93	297.31
Stone, clay, and glass products .....	401.94	412.30	418.49	421.18	419.48	414.24	414.92	414.34	403.56	412.10	425.00	428.71	429.71	427.55	432.00
Primary metal industries .....	478.30	484.72	480.32	486.30	480.65	491.99	504.38	493.66	503.52	504.78	499.20	501.23	499.09	496.08	492.48
Blast furnaces and basic steel products .....	528.29	548.27	550.43	553.32	544.79	557.35	564.48	556.72	578.84	576.84	569.38	576.58	577.41	585.15	578.93
Fabricated metal products .....	389.16	400.61	397.17	405.18	403.94	406.02	422.17	407.79	403.85	409.03	403.44	404.84	408.04	397.94	402.62
Machinery, except electrical .....	417.32	427.04	422.71	431.81	430.97	438.06	452.60	437.85	437.00	442.24	437.83	437.83	439.94	431.90	427.92
Electrical and electronic equipment .....	370.64	384.48	383.80	387.32	387.73	396.89	408.50	394.56	389.76	395.38	392.50	393.31	394.01	393.01	397.03
Transportation equipment .....	520.94	541.87	530.04	544.43	545.71	551.27	577.25	555.13	545.69	552.12	542.71	537.18	540.17	528.71	537.63
Motor vehicles and equipment .....	557.57	583.77	565.68	585.03	585.98	588.12	625.59	595.58	583.01	592.84	574.10	567.09	572.61	557.11	566.04
Instruments and related products .....	365.09	375.56	373.11	380.18	376.07	382.85	400.01	383.05	384.99	389.57	385.81	382.58	385.81	382.04	383.13
Miscellaneous manufacturing .....	277.77	287.62	284.65	293.20	295.00	296.27	304.44	297.70	294.75	299.65	297.75	297.08	298.58	294.10	296.29
<b>Nondurable goods</b> .....	332.69	344.92	345.39	349.20	347.93	351.60	359.24	352.63	347.31	352.54	351.65	354.22	355.51	356.00	358.49
Food and kindred products .....	333.92	342.80	342.55	348.02	343.80	346.12	354.50	347.93	339.69	344.36	346.50	352.08	350.47	350.88	354.19
Tobacco manufactures .....	436.46	444.17	457.81	434.32	444.48	435.71	448.82	448.25	453.11	478.50	469.94	504.43	523.94	500.48	489.71
Textile mill products .....	257.75	266.39	270.14	275.40	276.48	279.75	283.45	278.80	274.57	278.52	278.92	282.08	283.04	277.67	289.54
Apparel and other textile products .....	202.02	208.57	208.25	210.45	211.23	212.75	215.18	213.01	207.28	211.70	211.48	210.97	213.65	209.30	212.07
Paper and allied products .....	448.67	466.34	465.89	473.49	472.40	477.20	490.40	479.37	472.57	477.60	474.05	479.27	480.57	486.60	487.64
Printing and publishing .....	356.64	367.04	370.88	374.74	371.64	375.51	384.90	371.35	370.74	377.19	374.07	374.60	370.50	373.88	380.14
Chemicals and allied products .....	463.83	484.36	482.56	486.97	486.72	495.60	503.63	495.75	492.48	494.76	495.26	499.38	502.67	502.49	499.98
Petroleum and coal products .....	587.33	604.58	607.07	621.37	619.76	610.64	622.29	616.03	612.45	621.41	615.96	605.66	622.16	615.53	617.27
Rubber and miscellaneous plastics products .....	345.69	350.99	346.76	351.82	350.99	356.42	366.66	359.77	356.29	360.14	356.75	360.50	361.38	356.40	365.15
Leather and leather products .....	210.13	216.50	216.71	219.21	216.95	219.21	220.96	217.41	209.88	212.72	213.81	215.80	221.68	217.56	217.56
<b>TRANSPORTATION AND PUBLIC UTILITIES</b> .....	438.13	450.30	454.52	458.14	453.46	457.81	460.92	452.01	456.29	457.83	450.45	450.06	455.86	457.04	457.78
<b>WHOLESALE TRADE</b> .....	342.27	351.74	351.12	354.97	351.74	355.36	360.14	355.42	355.68	357.34	355.81	356.74	358.82	358.05	358.44
<b>RETAIL TRADE</b> .....	174.33	174.64	176.99	175.81	173.74	173.73	178.50	173.06	172.74	174.27	173.69	174.60	176.71	178.50	177.91
<b>FINANCE, INSURANCE, AND REAL ESTATE</b> .....	278.50	289.02	287.13	293.46	290.76	291.77	299.11	296.30	304.70	304.61	301.76	301.65	306.34	302.48	303.68
<b>SERVICES</b> .....	247.43	256.43	256.50	258.88	259.68	260.02	263.90	263.09	264.71	265.03	263.09	262.44	264.06	263.38	264.52

- Data not available.  
P = preliminary

NOTE: See "Notes on the data" for a description of the most recent benchmark revision.

17. The Hourly Earnings Index for production or nonsupervisory workers on private nonagricultural payrolls by industry

Industry	Not seasonally adjusted				Seasonally adjusted					
	Aug. 1985	June 1986	July 1986 <sup>P</sup>	Aug. 1986 <sup>P</sup>	Aug. 1985	Apr. 1986	May 1986	June 1986	July 1986 <sup>P</sup>	Aug. 1986 <sup>P</sup>
<b>PRIVATE SECTOR (in current dollars)</b> .....	164.7	168.8	168.5	168.4	165.5	168.4	168.7	169.2	168.8	169.2
Mining <sup>1</sup> .....	178.8	181.4	181.6	181.6	-	-	-	-	-	-
Construction .....	150.5	150.5	150.4	151.7	150.3	150.6	151.0	151.4	150.9	151.7
Manufacturing .....	168.6	172.3	172.7	172.0	169.4	172.0	172.5	172.4	172.6	172.8
Transportation and public utilities .....	166.1	169.5	169.2	169.1	166.6	169.3	170.1	170.7	170.3	169.6
Wholesale trade <sup>1</sup> .....	168.3	172.0	171.4	171.6	-	-	-	-	-	-
Retail trade .....	154.8	157.9	157.4	157.1	155.7	157.3	157.2	157.8	157.7	158.2
Finance, insurance, and real estate <sup>1</sup> .....	171.4	180.5	179.2	179.4	-	-	-	-	-	-
Services .....	167.2	173.3	172.2	172.4	168.9	173.1	173.4	174.3	173.2	174.2
<b>PRIVATE SECTOR (in constant dollars)</b> .....	93.5	94.8	94.7	-	94.1	95.4	95.4	95.2	95.1	-

<sup>1</sup> This series is not seasonally adjusted because the seasonal component is small relative to the trend-cycle, irregular components, or both, and consequently cannot be separated with sufficient precision.  
- Data not available.

P = preliminary.  
NOTE: See "Notes on the data" for a description of the most recent benchmark revision.

18. Indexes of diffusion: industries in which employment increased, data seasonally adjusted

(In percent)

Time span and year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
<b>Over 1-month span</b>												
1984	67.8	72.7	67.6	67.6	62.4	65.4	62.2	55.9	50.5	63.0	53.5	57.0
1985	52.4	47.8	53.8	49.2	51.6	47.0	56.2	56.8	50.8	61.9	57.6	59.5
1986	59.7	53.5	45.1	54.1	49.2	46.2	52.7	58.4	-	-	-	-
<b>Over 3-month span</b>												
1984	76.5	75.1	75.9	71.4	71.6	68.1	63.2	58.1	56.8	53.5	58.1	53.0
1985	51.1	49.7	46.2	46.2	45.1	51.4	49.7	51.1	55.1	55.9	61.4	60.5
1986	58.1	54.3	51.1	49.7	48.4	43.8	49.5	-	-	-	-	-
<b>Over 6-month span</b>												
1984	78.1	76.5	77.0	75.1	69.2	65.1	63.2	59.2	58.6	53.2	49.7	54.9
1985	49.2	47.8	43.0	45.9	44.3	44.3	48.9	50.8	54.1	57.0	57.0	55.9
1986	53.8	53.8	47.6	44.9	47.8	-	-	-	-	-	-	-
<b>Over 12-month span</b>												
1984	81.1	78.1	72.2	72.2	68.9	67.8	65.7	62.7	59.7	54.6	51.4	48.6
1985	46.2	45.7	46.8	43.8	44.9	47.3	47.6	48.9	47.3	49.5	48.9	48.6
1986	50.3	51.6	-	-	-	-	-	-	-	-	-	-

- Data not available.

NOTE: Figures are the percent of industries with employment rising. (Half of the unchanged components are counted as rising.) Data are centered within the

spans. Data for the most 2 recent months shown in each span are preliminary. See the "Definitions" in this section. See "Notes on the data" for a description of the most recent benchmark revision.

19. Annual data: Employment status of the noninstitutional population

(Numbers in thousands)

Employment status	1977	1978	1979	1980	1981	1982	1983	1984	1985
Noninstitutional population	160,689	163,541	166,460	169,349	171,775	173,939	175,891	178,080	179,912
Labor force									
Total (number)	100,665	103,882	106,559	108,544	110,315	111,872	113,226	115,241	117,167
Percent of population	62.6	63.5	64.0	64.1	64.2	64.3	64.4	64.7	65.1
Employed									
Total (number)	93,673	97,679	100,421	100,907	102,042	101,194	102,510	106,702	108,856
Percent of population	58.3	59.7	60.3	59.6	59.4	58.2	58.3	59.9	60.5
Resident Armed Forces	1,656	1,631	1,597	1,604	1,645	1,668	1,676	1,697	1,706
Civilian									
Total	92,017	96,048	98,824	99,303	100,397	99,526	100,834	105,005	107,150
Agriculture	3,283	3,387	3,347	3,364	3,368	3,401	3,383	3,321	3,179
Nonagricultural industries	88,734	92,661	95,477	95,938	97,030	96,125	97,450	101,685	103,971
Unemployed									
Total (number)	6,991	6,202	6,137	7,637	8,273	10,678	10,717	8,539	8,312
Percent of labor force	6.9	6.0	5.8	7.0	7.5	9.5	9.5	7.4	7.1
Not in labor force (number)	60,025	59,659	59,900	60,806	61,460	62,067	62,665	62,839	62,744

20. Annual data: Employment levels by industry

(Numbers in thousands)

Industry	1977	1978	1979	1980	1981	1982	1983	1984	1985
Total employment	82,471	86,697	89,823	90,406	91,156	89,566	90,200	94,496	97,614
Private sector	67,344	71,026	73,876	74,166	75,126	73,729	74,330	78,472	81,199
Goods-producing	24,346	25,585	26,461	25,658	25,497	23,813	23,334	24,727	24,930
Mining	813	851	958	1,027	1,139	1,128	952	966	930
Construction	3,851	4,229	4,463	4,346	4,188	3,905	3,948	4,383	4,687
Manufacturing	19,682	20,505	21,040	20,285	20,170	18,781	18,434	19,378	19,314
Service-producing	58,125	61,113	63,363	64,748	65,659	65,753	66,866	69,769	72,684
Transportation and public utilities	4,713	4,923	5,136	5,146	5,165	5,082	4,954	5,159	5,242
Wholesale trade	4,708	4,969	5,204	5,275	5,358	5,278	5,268	5,555	5,740
Retail trade	13,808	14,573	14,989	15,035	15,189	15,179	15,613	16,545	17,360
Finance, insurance, and real estate	4,467	4,724	4,975	5,160	5,298	5,341	5,468	5,689	5,953
Services	15,303	16,252	17,112	17,890	18,619	19,036	19,694	20,797	21,974
Government	15,127	15,672	15,947	16,241	16,031	15,837	15,869	16,024	16,415
Federal	2,727	2,753	2,773	2,866	2,772	2,739	2,774	2,807	2,875
State	3,377	3,474	3,541	3,610	3,640	3,640	3,662	3,734	3,848
Local	9,023	9,446	9,633	9,765	9,619	9,458	9,434	9,482	9,692

NOTE: See "Notes on the data" for a description of the most recent benchmark revision.

**21. Annual data: Average hours and earnings of production or nonsupervisory workers on nonagricultural payrolls, by industry**

Industry	1977	1978	1979	1980	1981	1982	1983	1984	1985
<b>Private sector</b>									
Average weekly hours .....	36.0	35.8	35.7	35.3	35.2	34.8	35.0	35.2	34.9
Average hourly earnings (in dollars) .....	5.25	5.69	6.16	6.66	7.25	7.68	8.02	8.32	8.57
Average weekly earnings (in dollars) .....	189.00	203.70	219.91	235.10	255.20	267.26	280.70	292.86	299.09
<b>Mining</b>									
Average weekly hours .....	43.4	43.4	43.0	43.3	43.7	42.7	42.5	43.3	43.4
Average hourly earnings (in dollars) .....	6.94	7.67	8.49	9.17	10.04	10.77	11.28	11.63	11.98
Average weekly earnings (in dollars) .....	301.20	332.88	365.07	397.06	438.75	459.88	479.40	503.58	519.93
<b>Construction</b>									
Average weekly hours .....	36.5	36.8	37.0	37.0	36.9	36.7	37.1	37.8	37.7
Average hourly earnings (in dollars) .....	8.10	8.66	9.27	9.94	10.82	11.63	11.94	12.13	12.31
Average weekly earnings (in dollars) .....	295.65	318.69	342.99	367.78	399.26	426.82	442.97	458.51	464.09
<b>Manufacturing</b>									
Average weekly hours .....	40.3	40.4	40.2	39.7	39.8	38.9	40.1	40.7	40.5
Average hourly earnings (in dollars) .....	5.68	6.17	6.70	7.27	7.99	8.49	8.83	9.19	9.53
Average weekly earnings (in dollars) .....	228.90	249.27	269.34	288.62	318.00	330.26	354.08	374.03	385.97
<b>Transportation and public utilities</b>									
Average weekly hours .....	39.9	40.0	39.9	39.6	39.4	39.0	39.0	39.4	39.5
Average hourly earnings (in dollars) .....	6.99	7.57	8.16	8.87	9.70	10.32	10.79	11.12	11.40
Average weekly earnings (in dollars) .....	278.90	302.80	325.58	351.25	382.18	402.48	420.81	438.13	450.30
<b>Wholesale trade</b>									
Average weekly hours .....	38.8	38.8	38.8	38.5	38.5	38.3	38.5	38.5	38.4
Average hourly earnings (in dollars) .....	5.39	5.88	6.39	6.96	7.56	8.09	8.55	8.89	9.16
Average weekly earnings (in dollars) .....	209.13	228.14	247.93	267.96	291.06	309.85	329.18	342.27	351.74
<b>Retail trade</b>									
Average weekly hours .....	31.6	31.0	30.6	30.2	30.1	29.9	29.8	29.8	29.4
Average hourly earnings (in dollars) .....	3.85	4.20	4.53	4.88	5.25	5.48	5.74	5.85	5.94
Average weekly earnings (in dollars) .....	121.66	130.20	138.62	147.38	158.03	163.85	171.05	174.33	174.64
<b>Finance, insurance, and real estate</b>									
Average weekly hours .....	36.4	36.4	36.2	36.2	36.3	36.2	36.2	36.5	36.4
Average hourly earnings (in dollars) .....	4.54	4.89	5.27	5.79	6.31	6.78	7.29	7.63	7.94
Average weekly earnings (in dollars) .....	165.26	178.00	190.77	209.60	229.05	245.44	263.90	278.50	289.02
<b>Services</b>									
Average weekly hours .....	33.0	32.8	32.7	32.6	32.6	32.6	32.7	32.6	32.5
Average hourly earnings (in dollars) .....	4.65	4.99	5.36	5.85	6.41	6.92	7.31	7.59	7.89
Average weekly earnings (in dollars) .....	153.45	163.67	175.27	190.71	208.97	225.59	239.04	247.43	256.43

22. Employment Cost Index, compensation,<sup>1</sup> by occupation and industry group

(June 1981 = 100)

Series	1984			1985				1986		Percent change	
	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June	3 months ended	12 months ended
										June 1986	
<b>Civilian workers</b> <sup>2</sup> .....	120.8	122.4	123.9	125.5	126.4	128.4	129.2	130.6	131.5	0.7	4.0
Workers, by occupational group:											
White-collar workers .....	122.1	124.0	125.5	127.3	128.3	130.7	131.6	133.1	134.2	.8	4.6
Blue-collar workers .....	118.6	119.6	120.9	122.2	123.1	124.4	124.9	126.2	126.8	.5	3.0
Service occupations .....	122.1	124.6	126.8	127.8	128.0	130.9	131.8	133.1	133.7	.5	4.5
Workers, by industry division:											
Manufacturing .....	119.1	120.4	122.0	123.9	124.6	125.5	126.0	127.7	128.7	.8	3.3
Nonmanufacturing .....	121.6	123.3	124.8	126.2	127.2	129.7	130.6	131.9	132.8	.7	4.4
Services .....	125.5	128.8	130.9	131.9	132.6	136.4	137.1	138.8	139.4	.4	5.1
Public administration <sup>3</sup> .....	123.7	126.9	128.6	130.1	130.3	134.2	134.8	136.8	138.0	.9	5.9
<b>Private industry workers</b> .....	120.1	121.1	122.7	124.2	125.2	126.8	127.5	128.9	129.9	.8	3.8
Workers, by occupational group:											
White-collar workers .....	121.4	122.4	123.9	125.8	127.1	128.8	129.8	131.3	132.5	.9	4.2
Blue-collar workers .....	118.4	119.3	120.6	121.9	122.8	124.0	124.4	125.7	126.3	.5	2.9
Service occupations .....	121.2	123.2	125.7	126.3	126.5	128.8	129.5	130.9	131.1	.2	3.6
Workers, by industry division:											
Manufacturing .....	119.1	120.4	122.0	123.9	124.6	125.5	126.0	127.7	128.7	.8	3.3
Nonmanufacturing .....	120.7	121.6	123.1	124.4	125.6	127.6	128.4	129.7	130.6	.7	4.0
<b>State and local government workers</b> .....	124.4	128.8	130.1	131.7	132.0	136.5	137.5	138.9	139.7	.6	5.8
Workers, by occupational group:											
White-collar workers .....	125.0	129.7	131.1	132.5	132.9	137.6	138.6	140.0	140.5	.4	5.7
Blue-collar workers .....	122.3	125.0	125.9	128.1	128.5	131.9	132.7	134.7	136.3	1.2	6.1
Workers, by industry division:											
Services .....	125.0	129.9	131.3	132.8	133.2	137.9	139.1	140.4	140.8	.3	5.7
Schools .....	124.7	130.6	132.0	133.4	133.7	139.1	140.3	141.5	141.7	.1	6.0
Elementary and secondary .....	125.7	132.1	133.5	134.4	134.6	140.9	142.0	143.0	143.2	.1	6.4
Hospitals and other services <sup>4</sup> .....	125.7	127.9	129.2	131.1	131.5	134.1	135.2	136.8	137.9	.8	4.9
Public administration <sup>3</sup> .....	123.7	126.9	128.6	130.1	130.3	134.2	134.8	136.8	138.0	.9	5.9

<sup>1</sup> Cost (cents-per-hour worked) measured in the Employment Cost Index consists of wages, salaries, and employer cost of employee benefits.

<sup>2</sup> Consist of private industry workers (excluding farm and household workers) and State and local government (excluding Federal Government) workers.

<sup>3</sup> Consists of legislative, judicial, administrative, and regulatory activities.

<sup>4</sup> Includes, for example, library, social, and health services.

NOTE: Beginning June 1986, ECI jobs are classified according to definitions used in the 1980 census. Prior to June 1986, they were classified according to the 1970 census. Differences between the two classification systems are slight, as indicated in "Introducing new weights for the Employment Cost Index," *Monthly Labor Review*, June 1985.

## 23. Employment Cost Index, wages and salaries, by occupation and industry group

(June 1981 = 100)

Series	1984			1985				1986		Percent change	
	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June	3 months ended	12 months ended
										June 1986	
<b>Civilian workers<sup>1</sup></b> .....	118.8	120.3	121.7	123.1	124.2	126.3	127.0	128.3	129.3	0.8	4.1
Workers, by occupational group:											
White-collar workers .....	120.4	122.2	123.5	125.2	126.4	128.8	129.8	131.2	132.4	.9	4.7
Blue-collar workers .....	116.1	117.0	118.2	119.3	120.5	122.0	122.3	123.4	124.1	.6	3.0
Service occupations .....	119.8	122.3	124.3	124.8	125.3	128.0	128.6	129.8	130.0	.2	3.8
Workers, by industry division											
Manufacturing .....	116.8	118.0	119.5	121.0	122.3	123.2	123.8	125.3	126.5	1.0	3.4
Nonmanufacturing .....	119.7	121.3	122.6	123.9	125.0	127.6	128.4	129.6	130.4	.6	4.3
Services .....	123.8	127.2	128.9	129.7	130.5	134.2	134.8	136.4	137.0	.4	5.0
Public administration <sup>2</sup> .....	121.3	124.4	125.7	127.0	127.2	131.4	132.0	133.8	134.6	.6	5.8
<b>Private industry workers</b> .....	118.2	119.2	120.6	122.0	123.3	124.9	125.6	126.8	127.9	.9	3.7
Workers, by occupational group:											
White-collar workers .....	119.9	120.9	122.3	124.0	125.5	127.3	128.3	129.6	131.1	1.2	4.5
Professional specialty and technical occupations .....	123.8	125.2	127.3	127.7	128.7	131.2	131.5	132.7	134.0	1.0	4.1
Executive, administrative, and managerial occupations .....	119.2	121.0	122.2	123.8	126.5	127.7	128.4	130.5	132.1	1.2	4.4
Sales occupations .....	111.9	110.5	111.6	116.3	117.4	119.3	122.5	122.4	124.3	1.6	5.9
Administrative support occupations, including clerical .....	120.7	122.0	122.9	124.7	125.6	127.1	127.9	129.6	130.8	.9	4.1
Blue-collar workers .....	115.9	116.7	118.0	119.1	120.3	121.7	122.0	123.1	123.7	.5	2.8
Precision production, craft, and repair occupations .....	117.3	118.0	119.4	120.8	122.0	123.7	123.8	125.3	125.7	.3	3.0
Machine operators, assemblers, and inspectors .....	115.8	116.6	117.9	118.9	120.1	121.1	121.6	122.6	123.6	.8	2.9
Transportation and material moving occupations .....	112.7	113.4	114.0	114.5	115.7	117.7	117.8	118.0	118.9	.8	2.8
Handlers, equipment cleaners, helpers, and laborers .....	114.1	114.7	115.9	116.7	118.5	118.6	119.8	120.0	120.3	.3	1.5
Service occupations .....	119.3	121.2	123.7	123.8	124.4	126.3	126.6	128.0	128.0	.0	2.9
Workers, by industry division:											
Manufacturing .....	116.8	118.0	119.5	121.0	122.3	123.2	123.8	125.3	126.5	1.0	3.4
Durables .....	116.6	117.7	119.1	120.6	122.0	122.7	123.4	124.8	125.8	.8	3.1
Nondurables .....	117.1	118.6	120.2	121.6	122.6	124.0	124.6	126.1	127.9	1.4	4.3
Nonmanufacturing .....	119.0	119.9	121.2	122.6	123.9	125.9	126.6	127.7	128.7	.8	3.9
Construction .....	114.0	114.3	114.4	115.5	116.6	117.3	117.9	118.3	119.8	1.3	2.7
Transportation and public utilities .....	119.3	119.9	120.7	121.7	122.8	124.8	125.2	126.3	126.6	.2	3.1
Wholesale and retail trade .....	116.0	116.5	118.1	118.8	121.1	122.7	123.7	124.5	125.8	1.0	3.9
Wholesale trade .....	120.0	120.7	122.9	123.7	126.8	127.7	128.3	129.7	131.2	1.2	3.5
Retail trade .....	114.4	114.9	116.2	116.9	118.9	120.8	121.9	122.5	123.7	1.0	4.0
Finance, insurance, and real estate .....	116.9	115.3	115.8	122.0	121.7	124.1	126.5	126.6	128.0	1.1	5.2
Services .....	124.7	127.1	129.5	129.9	131.0	133.9	134.1	136.2	136.9	.5	4.5
<b>State and local government workers</b> .....	122.0	126.1	127.1	128.4	128.7	133.2	134.2	135.5	136.0	.4	5.7
Workers, by occupational group:											
White-collar workers .....	122.5	127.1	128.0	129.3	129.6	134.3	135.3	136.6	137.0	.3	5.7
Blue-collar workers .....	119.6	121.9	122.5	124.2	124.5	127.9	128.4	130.4	131.9	1.2	5.9
Workers, by industry division											
Services .....	122.5	127.2	128.1	129.4	129.7	134.5	135.6	136.8	137.1	.2	5.7
Schools .....	122.3	127.8	128.7	129.9	130.2	135.8	137.0	138.0	138.2	.1	6.1
Elementary and secondary .....	123.0	129.3	130.2	130.8	131.1	137.5	138.5	139.4	139.4	.0	6.3
Hospitals and other services <sup>3</sup> .....	123.1	125.1	125.9	127.7	128.0	130.2	130.9	132.4	133.3	.7	4.1
Public administration <sup>2</sup> .....	121.3	124.4	125.7	127.0	127.2	131.4	132.0	133.8	134.6	.6	5.8

<sup>1</sup> Consists of private industry workers (excluding farm and household workers) and State and local government (excluding Federal Government) workers.

<sup>2</sup> Consists of legislative, judicial, administrative, and regulatory activities.

<sup>3</sup> Includes, for example, library, social and health services.

NOTE: Beginning June 1986, ECI jobs are classified according to definitions

used in the 1980 census. Prior to June 1986, they were classified according to the 1970 census. Differences between the two classification systems are slight, as indicated in "Introducing new weights for the Employment Cost Index," *Monthly Labor Review*, June 1986.

24. Employment Cost Index, private nonfarm workers, by bargaining status, region, and area size

(June 1981 = 100)

Series	1984			1985				1986		Percent change	
	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June	3 months ended	12 months ended
										June 1986	
<b>COMPENSATION</b>											
<b>Workers, by bargaining status<sup>1</sup></b>											
Union .....	121.7	122.6	123.9	124.8	125.5	126.5	127.1	128.4	128.7	0.2	2.5
Manufacturing .....	120.5	121.6	123.2	124.2	124.2	125.0	125.5	127.0	126.9	-.1	2.2
Nonmanufacturing .....	122.8	123.6	124.5	125.3	126.6	127.8	128.6	129.7	130.4	.5	3.0
Nonunion .....	119.2	120.3	121.9	123.8	125.0	126.8	127.5	129.0	130.2	.9	4.2
Manufacturing .....	117.9	119.3	120.8	123.6	124.8	125.7	126.3	128.1	129.7	1.2	3.9
Nonmanufacturing .....	119.8	120.7	122.4	123.9	125.1	127.3	128.1	129.5	130.4	.7	4.2
<b>Workers, by region<sup>1</sup></b>											
Northeast .....	120.7	122.4	123.8	125.1	126.4	128.8	129.9	131.6	133.3	1.3	5.5
South .....	120.7	120.7	122.2	124.2	125.2	126.5	127.2	128.7	129.6	.7	3.5
Midwest (formerly North Central) .....	117.9	119.7	120.8	122.0	122.7	124.2	124.6	125.9	126.2	.2	2.9
West .....	122.2	122.5	124.9	126.8	127.9	129.1	129.8	130.8	131.6	.6	2.9
<b>Workers, by area size<sup>1</sup></b>											
Metropolitan areas .....	120.6	121.5	123.2	124.7	125.7	127.3	128.1	129.5	130.5	.8	3.8
Other areas .....	117.4	119.0	119.8	121.4	122.5	123.9	123.9	125.5	126.4	.7	3.2
<b>WAGES AND SALARIES</b>											
<b>Workers, by bargaining status<sup>1</sup></b>											
Union .....	119.0	119.8	120.9	121.7	123.0	124.1	124.7	125.6	126.1	.4	2.5
Manufacturing .....	117.1	118.1	119.5	120.4	121.7	122.8	123.3	124.2	124.6	.3	2.4
Nonmanufacturing .....	120.7	121.3	122.1	122.8	124.1	125.3	125.9	126.9	127.4	.4	2.7
Nonunion .....	117.8	118.8	120.4	122.1	123.4	125.2	125.9	127.3	128.5	.9	4.1
Manufacturing .....	116.5	117.9	119.5	121.5	122.8	123.7	124.4	126.1	127.7	1.3	4.0
Nonmanufacturing .....	118.3	119.2	120.7	122.3	123.6	125.9	126.6	127.8	128.9	.9	4.3
<b>Workers, by region<sup>1</sup></b>											
Northeast .....	118.9	120.5	121.9	123.0	124.6	126.8	128.1	129.2	131.3	1.6	5.4
South .....	119.0	119.0	120.2	122.3	123.4	124.8	125.4	126.8	127.8	.8	3.6
Midwest (formerly North Central) .....	116.0	117.8	118.7	119.6	121.1	122.5	122.9	124.2	124.4	.2	2.7
West .....	119.6	120.0	122.5	124.0	125.1	126.6	127.1	128.1	128.9	.6	3.0
<b>Workers, by area size<sup>1</sup></b>											
Metropolitan areas .....	118.6	119.5	121.0	122.4	123.8	125.5	126.3	127.4	128.5	.9	3.8
Other areas .....	116.0	117.5	118.3	119.6	120.6	121.9	122.0	123.6	124.5	.7	3.2

<sup>1</sup> The indexes are calculated differently from those for the occupation and industry groups. For a detailed description of the index calculation, see the *Monthly Labor Review* Technical Note, "Estimation procedures for the

Employment Cost Index," May 1982.

NOTE: Beginning June 1986, ECI measures are based on fixed employment counts from the 1980 Census of Population, rather than from the 1970 census.

**25. Specified compensation and wage adjustments from contract settlements, and effective wage adjustments, private industry collective bargaining situations covering 1,000 workers or more (in percent)**

Measure	Annual average		Quarterly average							
	1984	1985	1984		1985				1986	
			III	IV	I	II	III	IV	I	II
<b>Specified adjustments:</b>										
Total compensation <sup>1</sup> adjustments, <sup>2</sup> settlements covering 5,000 workers or more:										
First year of contract .....	3.6	2.6	2.7	3.7	3.6	3.5	2.0	2.0	0.4	0.7
Annual rate over life of contract .....	2.8	2.7	3.1	2.0	2.7	3.4	3.0	1.4	1.3	1.6
Wage adjustments, settlements covering 1,000 workers or more:										
First year of contract .....	2.4	2.3	2.1	2.3	3.3	2.5	2.0	2.1	1.0	1.3
Annual rate over life of contract .....	2.4	2.7	2.6	1.5	3.2	2.8	3.1	1.9	1.6	2.0
<b>Effective adjustments:</b>										
Total effective wage adjustment <sup>3</sup> .....	3.7	3.3	1.2	.7	.7	.8	1.2	.5	.6	.7
From settlements reached in period .....	.8	.7	.2	.3	.1	.2	.2	.1	.0	.2
Deferred from settlements reached in earlier periods .....	2.0	1.8	.7	.2	.6	.5	.5	.2	.4	.6
From cost-of-living-adjustments clauses .....	.9	.7	.3	.2	.1	.1	.4	.1	.2	.0

<sup>1</sup> Compensation includes wages, salaries, and employers' cost of employee benefits when contract is negotiated.

compensation or wages.

<sup>3</sup> Because of rounding total may not equal sum of parts.

<sup>2</sup> Adjustments are the net result of increases, decreases, and no changes in

P = preliminary.

**26. Average specified compensation and wage adjustments, major collective bargaining settlements in private industry situations covering 1,000 workers or more during 4-quarter periods (in percent)**

Measure	Average for four quarters ending--							
	1984		1985				1986	
	III	IV	I	II	III	IV	I	II
Specified total compensation adjustments, settlements covering 5,000 workers or more, all industries:								
First year of contract .....	4.2	3.6	3.4	3.4	3.1	2.6	2.3	1.5
Annual rate over life of contract .....	3.2	2.8	2.6	2.7	2.7	2.7	2.6	2.0
Specified wage adjustments, settlements covering 1,000 workers or more:								
All industries								
First year of contract .....	3.2	2.4	2.4	2.4	2.4	2.3	2.0	1.7
Contracts with COLA clauses .....	4.5	2.9	2.5	2.3	1.9	1.6	1.6	1.6
Contracts without COLA clauses .....	2.3	2.1	2.4	2.4	2.7	2.7	2.2	1.7
Annual rate over life of contract .....	2.8	2.4	2.3	2.4	2.5	2.7	2.5	2.3
Contracts with COLA clauses .....	2.8	1.8	1.3	1.5	1.8	2.5	2.5	2.5
Contracts without COLA clauses .....	2.8	2.7	2.8	2.8	3.0	2.8	2.5	2.2
Manufacturing								
First year of contract .....	2.6	2.3	2.1	2.0	1.5	.8	.9	.1
Contracts with COLA clauses .....	1.5	2.1	2.0	1.9	1.5	.8	.8	.7
Contracts without COLA clauses .....	3.7	2.9	2.5	2.2	1.5	.9	.9	-.4
Annual rate over life of contract .....	2.8	1.5	1.4	1.5	1.6	1.8	1.8	1.4
Contracts with COLA clauses .....	1.8	1.0	.9	1.0	1.4	2.1	2.1	2.0
Contracts without COLA clauses .....	3.8	3.3	3.2	3.0	2.4	1.6	1.5	.9
Nonmanufacturing								
First year of contract .....	3.3	2.5	2.6	2.7	3.2	3.3	2.8	2.7
Contracts with COLA clauses .....	5.4	5.5	5.1	4.3	4.0	3.6	3.5	3.2
Contracts without COLA clauses .....	2.1	2.0	2.4	2.5	3.0	3.3	2.7	2.6
Annual rate over life of contract .....	2.8	2.9	2.8	2.9	3.3	3.3	3.0	2.9
Contracts with COLA clauses .....	3.1	4.8	4.0	3.8	3.9	3.6	3.6	3.3
Contracts without COLA clauses .....	2.6	2.6	2.7	2.8	3.2	3.3	2.9	2.8
Construction								
First year of contract .....	.9	.5	.9	1.1	1.0	1.5	1.7	2.4
Contracts with COLA clauses .....	4.0	4.0	4.6	9.2	( <sup>1</sup> )	( <sup>1</sup> )	( <sup>1</sup> )	.7
Contracts without COLA clauses .....	.9	.4	.8	1.0	( <sup>1</sup> )	( <sup>1</sup> )	( <sup>1</sup> )	2.5
Annual rate over life of contract .....	1.4	1.0	1.4	1.7	1.7	2.1	2.2	2.6
Contracts with COLA clauses .....	1.4	1.4	1.7	4.6	( <sup>1</sup> )	( <sup>1</sup> )	( <sup>1</sup> )	1.1
Contracts without COLA clauses .....	1.4	1.0	1.4	1.7	( <sup>1</sup> )	( <sup>1</sup> )	( <sup>1</sup> )	2.6

<sup>1</sup> Data do not meet publication standards.

P = preliminary.

**27. Average effective wage adjustments, private industry collective bargaining situations covering 1,000 workers or more during 4-quarter periods (in percent)**

Effective wage adjustment	Average for four quarters ending--						
	1984	1985				1986	
	IV	I	II	III	IV	I	II <sup>P</sup>
<b>For all workers:<sup>1</sup></b>							
Total .....	3.7	3.6	3.5	3.5	3.3	3.1	2.9
From settlements reached in period .....	.8	.7	.9	.9	.7	.6	.5
Deferred from settlements reached in earlier period .....	2.0	2.2	1.9	1.8	1.8	1.7	1.8
From cost-of-living-adjustments clauses .....	.9	.7	.7	.8	.7	.8	.7
<b>For workers receiving changes:</b>							
Total .....	4.4	4.5	4.2	4.3	4.1	4.0	3.8
From settlements reached in period .....	3.0	2.9	2.9	2.8	3.4	2.9	2.5
Deferred from settlements reached in earlier period .....	4.0	4.2	3.9	3.7	3.7	3.5	3.4
From cost-of-living-adjustments clauses .....	2.7	2.3	2.3	2.8	2.2	2.5	2.1

<sup>1</sup> Because of rounding total may not equal sum of parts.

<sup>P</sup> = preliminary.

**28. Specified compensation and wage adjustments from contract settlements, and effective wage adjustments, State and local government collective bargaining situations covering 1,000 workers or more (in percent)**

Measure	Annual average		First 6 months 1986 <sup>P</sup>
	1984	1985	
<b>Specified adjustments:</b>			
Total compensation <sup>1</sup> adjustments, <sup>2</sup> settlements covering 5,000 workers or more:			
First year of contract .....	5.2	4.2	6.7
Annual rate over life of contract .....	5.4	5.1	6.4
<b>Wage adjustments, settlements covering 1,000 workers or more:</b>			
First year of contract .....	4.8	4.6	6.1
Annual rate over life of contract .....	5.1	5.4	6.0
<b>Effective adjustments:</b>			
Total effective wage adjustment <sup>3</sup> .....	5.0	5.7	1.8
From settlements reached in period .....	1.9	4.1	0.6
Deferred from settlements reached in earlier periods .....	3.1	1.6	1.2
From cost-of-living-adjustment clauses .....	( <sup>4</sup> )	( <sup>4</sup> )	(4)

<sup>1</sup> Compensation includes wages, salaries, and employers' cost of employee benefits when contract is negotiated.

<sup>2</sup> Adjustments are the net result of increases, decreases, and no changes in compensation or wages.

<sup>3</sup> Because of rounding total may not equal sum of parts.

<sup>4</sup> Less than 0.05 percent.

<sup>P</sup> = preliminary.

**29. Work stoppages involving 1,000 workers or more**

Measure	Annual totals		1985					1986							
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan. <sup>P</sup>	Feb. <sup>P</sup>	Mar. <sup>P</sup>	Apr. <sup>P</sup>	May <sup>P</sup>	June <sup>P</sup>	July <sup>P</sup>	Aug. <sup>P</sup>
<b>Number of stoppages:</b>															
Beginning in period .....	62	54	6	11	6	3	2	4	3	2	3	5	10	10	8
In effect during period .....	68	61	18	20	20	13	9	7	7	8	8	10	15	20	19
<b>Workers involved:</b>															
Beginning in period (in thousands) .....	376.0	323.9	15.3	69.5	76.6	26.2	8.2	7.6	24.0	11.2	6.1	28.6	198.0	40.9	110.7
In effect during period (in thousands) .....	391.0	584.1	66.8	93.9	119.3	47.0	38.0	12.0	28.4	38.6	17.6	41.2	205.9	57.1	131.1
<b>Days idle:</b>															
Number (in thousands) .....	8,499.0	7,079.0	810.8	863.8	1,428.8	688.2	661.9	170.0	309.5	367.5	297.3	303.6	3,684.3	831.6	1,514.3
Percent of estimated working time <sup>1</sup> .....	.04	.03	.04	.04	.06	.04	.03	.01	.02	.02	.02	.02	.07	.04	.07

<sup>1</sup> Agricultural and government employees are included in the total employed and total working time: private household, forestry, and fishery employees are excluded. An explanation of the measurement of idleness as a percentage of the total time worked is

found in "'Total economy' measure of strike idleness," *Monthly Labor Review*, October 1968, pp. 54-56.

<sup>P</sup> = preliminary



### 30. Consumer Price Index for All Urban Consumers: U.S. city average, by expenditure category and commodity or service group; and CPI for Urban Wage Earners and Clerical Workers, all items

(1967=100, unless otherwise indicated)

Series	Annual average		1985					1986						
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July
<b>CONSUMER PRICE INDEX FOR ALL URBAN CONSUMERS:</b>														
All items .....	311.1	322.2	323.5	324.5	325.5	326.6	327.4	328.4	327.5	326.0	325.3	326.3	327.9	328.0
All items (1957-59=100) .....	361.9	374.7	376.2	377.4	378.5	379.9	380.8	381.9	380.8	379.1	378.3	379.5	381.4	381.4
<b>Food and beverages .....</b>	<b>295.1</b>	<b>302.0</b>	<b>301.8</b>	<b>302.1</b>	<b>302.5</b>	<b>303.6</b>	<b>305.6</b>	<b>307.9</b>	<b>307.7</b>	<b>307.8</b>	<b>308.5</b>	<b>309.4</b>	<b>309.5</b>	<b>312.2</b>
Food .....	302.9	309.8	309.7	309.9	309.8	311.0	313.2	315.6	315.3	315.4	316.1	317.0	317.1	320.1
Food at home .....	292.6	296.8	295.9	295.6	295.3	296.6	299.3	302.5	301.5	301.2	301.5	302.1	301.6	305.5
Cereals and bakery products .....	305.3	317.0	318.5	319.2	318.9	319.9	321.9	322.0	322.5	322.7	322.5	323.8	326.1	326.3
Meats, poultry, fish, and eggs .....	266.6	263.4	259.7	260.6	261.1	266.1	269.9	271.5	268.4	267.7	264.2	263.4	265.1	274.9
Dairy products .....	253.2	258.0	257.4	258.0	257.1	257.1	256.9	257.2	257.3	256.8	256.8	257.1	257.2	258.4
Fruits and vegetables .....	317.4	325.7	326.3	319.9	317.1	314.3	323.9	334.4	320.7	319.2	329.5	336.5	327.8	330.3
Other foods at home .....	352.2	361.1	361.7	362.6	363.0	362.2	361.3	365.7	375.1	375.7	376.1	374.6	374.1	373.7
Sugar and sweets .....	389.1	398.8	401.8	401.1	402.6	401.4	402.2	405.1	408.6	408.4	411.4	411.2	411.5	412.4
Fats and oils .....	288.0	294.4	297.1	294.8	291.2	292.1	290.3	292.1	291.4	290.2	288.5	287.2	287.0	287.3
Nonalcoholic beverages .....	443.0	451.7	449.6	452.8	454.1	451.7	448.8	459.7	485.3	488.0	487.4	481.9	480.0	478.3
Other prepared foods .....	284.9	294.2	295.8	296.3	296.8	296.8	297.3	298.0	299.5	299.3	300.2	301.4	301.7	301.8
Food away from home .....	333.4	346.6	348.4	349.9	350.3	351.3	352.1	353.1	354.2	355.5	357.0	358.8	360.2	360.8
Alcoholic beverages .....	222.1	229.5	228.9	229.3	236.4	236.2	236.2	237.5	238.3	238.8	239.5	239.4	240.1	240.4
<b>Housing .....</b>	<b>336.5</b>	<b>349.9</b>	<b>352.9</b>	<b>353.8</b>	<b>354.4</b>	<b>355.0</b>	<b>355.8</b>	<b>356.8</b>	<b>356.5</b>	<b>357.0</b>	<b>358.0</b>	<b>358.5</b>	<b>361.2</b>	<b>361.5</b>
Shelter .....	361.7	382.0	385.9	386.9	389.1	391.3	392.3	393.8	394.8	397.0	400.1	400.9	401.6	403.5
Renters' costs (12/82=100) .....	108.6	115.4	116.6	117.0	117.9	118.4	118.3	118.8	119.0	119.6	120.9	121.1	121.6	122.5
Rent, residential .....	249.3	264.6	266.6	267.7	269.9	271.7	272.4	273.4	273.7	275.0	277.9	278.4	279.4	281.2
Other renters' costs .....	373.4	398.4	409.9	410.7	412.5	408.7	398.1	401.1	404.1	405.5	410.8	411.3	415.2	420.1
Homeowners' costs (12/82=100) .....	107.3	113.1	114.3	114.6	115.1	115.8	116.3	116.7	117.0	117.9	118.7	118.9	119.0	119.4
Owners' equivalent rent (12/82=100) .....	107.3	113.2	114.3	114.6	115.1	115.9	116.3	116.7	117.0	117.9	118.7	118.9	119.0	119.4
Household insurance (12/82=100) .....	105.5	112.4	113.0	113.7	114.6	114.5	115.0	115.7	117.4	118.0	118.3	118.8	118.9	119.9
Maintenance and repairs .....	359.2	368.9	370.6	368.7	368.5	372.7	373.7	379.1	379.6	367.5	367.6	367.1	366.6	369.2
Maintenance and repair services .....	409.7	421.1	425.1	421.9	422.2	426.4	426.2	432.6	432.8	422.4	424.6	425.5	427.4	430.1
Maintenance and repair commodities .....	262.7	269.6	269.2	268.6	268.0	271.5	273.3	277.1	277.8	266.1	264.5	262.9	260.7	262.7
<b>Fuel and other utilities .....</b>	<b>387.3</b>	<b>393.6</b>	<b>398.9</b>	<b>400.5</b>	<b>395.6</b>	<b>392.1</b>	<b>393.3</b>	<b>394.6</b>	<b>390.0</b>	<b>385.5</b>	<b>381.8</b>	<b>382.5</b>	<b>393.8</b>	<b>389.4</b>
Fuels .....	485.5	488.1	494.4	496.8	488.4	481.5	483.6	484.7	476.3	467.6	459.6	460.6	477.0	469.2
Fuel oil, coal, and bottled gas .....	641.8	619.5	694.6	601.7	615.3	641.6	657.3	650.3	591.2	549.9	518.3	496.8	486.6	459.4
Gas (piped) and electricity .....	445.2	452.7	465.1	466.5	453.9	440.5	439.9	442.6	444.5	442.3	439.2	444.6	466.0	462.3
Other utilities and public services .....	230.2	240.7	244.2	244.6	244.7	245.9	245.8	247.3	247.9	249.0	251.3	251.5	255.2	255.6
Household furnishings and operations .....	242.5	247.2	247.0	247.1	248.4	248.9	248.8	248.8	249.0	249.8	249.6	249.9	250.2	250.5
Housefurnishings .....	199.1	200.1	199.1	199.0	200.3	200.8	200.1	199.8	199.7	201.0	200.4	200.8	200.8	201.2
Housekeeping supplies .....	303.2	313.6	313.5	313.9	315.7	316.4	317.7	318.3	318.6	317.9	318.5	318.3	319.6	319.5
Housekeeping services .....	327.5	338.9	340.7	341.5	342.2	342.7	343.2	343.9	344.5	345.1	345.4	345.8	346.1	346.6
<b>Apparel and upkeep .....</b>	<b>200.2</b>	<b>206.0</b>	<b>205.3</b>	<b>209.6</b>	<b>211.1</b>	<b>211.2</b>	<b>209.0</b>	<b>205.0</b>	<b>204.1</b>	<b>206.3</b>	<b>207.3</b>	<b>206.4</b>	<b>204.5</b>	<b>203.2</b>
Apparel commodities .....	187.0	191.6	190.6	195.3	196.7	196.8	194.2	189.5	188.5	190.8	191.7	190.7	188.4	187.0
Men's and boys' apparel .....	192.4	197.9	197.2	201.5	203.2	203.6	202.0	198.6	196.8	198.3	199.7	200.2	198.1	195.8
Women's and girls' apparel .....	163.6	169.5	167.7	176.1	177.9	176.5	172.6	164.4	163.4	167.6	168.0	164.9	161.3	159.8
Infants' and toddlers' apparel .....	287.0	299.7	300.6	302.0	302.1	307.0	304.1	313.9	311.6	313.1	316.6	318.5	319.7	307.5
Footwear .....	209.5	212.1	210.3	210.9	212.3	215.5	213.1	209.1	207.9	210.1	211.4	211.5	210.0	209.1
Other apparel commodities .....	216.4	215.5	217.5	215.2	214.9	214.9	214.6	215.5	216.1	214.6	215.3	215.4	215.8	218.1
Apparel services .....	305.0	320.9	322.9	324.1	325.7	326.3	326.9	329.8	330.7	331.5	332.9	333.6	334.3	334.6
<b>Transportation .....</b>	<b>311.7</b>	<b>319.9</b>	<b>320.7</b>	<b>319.7</b>	<b>320.9</b>	<b>323.2</b>	<b>324.0</b>	<b>323.9</b>	<b>319.2</b>	<b>309.6</b>	<b>303.3</b>	<b>305.7</b>	<b>308.6</b>	<b>304.7</b>
Private transportation .....	306.6	314.2	314.9	313.6	314.7	317.0	317.8	317.3	312.2	302.1	295.3	297.8	300.8	296.5
New vehicles .....	208.0	214.9	214.2	214.2	215.9	218.2	219.2	219.7	220.2	220.1	221.0	222.8	224.0	224.5
New cars .....	208.5	215.2	214.6	214.5	216.2	218.4	219.4	219.9	220.4	220.3	221.2	223.0	224.2	224.7
Used cars .....	375.7	379.7	374.0	374.3	375.3	376.4	375.6	374.1	370.7	367.2	364.8	363.6	362.5	360.3
Motor fuel .....	370.7	373.8	381.9	377.7	374.6	376.7	377.5	373.3	351.5	308.5	279.5	289.3	294.4	280.2
Gasoline .....	370.2	373.3	381.8	377.4	374.2	376.1	376.8	372.5	350.8	307.7	278.6	288.7	299.1	279.8
Maintenance and repair .....	341.5	351.4	351.9	353.5	355.7	355.8	357.5	357.9	358.9	359.3	360.6	361.3	362.1	363.4
Other private transportation .....	273.3	287.6	287.7	285.8	289.6	293.9	295.2	297.7	299.2	301.5	301.6	301.3	303.0	304.5
Other private transportation commodities .....	201.5	202.6	202.8	203.4	202.8	201.6	202.1	203.4	202.9	203.6	202.2	202.4	201.5	201.6
Other private transportation services .....	295.0	312.8	313.0	310.4	315.4	321.2	322.7	325.5	327.6	330.3	330.9	330.4	332.8	334.6
Public transportation .....	385.2	402.8	403.7	408.0	411.5	412.8	412.9	419.6	422.2	421.2	422.2	423.7	425.4	428.0
<b>Medical care .....</b>	<b>379.5</b>	<b>403.1</b>	<b>406.6</b>	<b>408.3</b>	<b>410.5</b>	<b>413.0</b>	<b>414.7</b>	<b>418.2</b>	<b>422.3</b>	<b>425.8</b>	<b>428.0</b>	<b>429.7</b>	<b>432.0</b>	<b>434.8</b>
Medical care commodities .....	239.7	256.7	259.3	260.2	261.3	262.7	262.9	264.5	267.4	269.4	271.3	272.3	273.3	275.4
Medical care services .....	410.3	435.1	438.6	440.5	443.0	445.8	448.0	451.9	456.2	460.1	462.3	464.2	466.8	469.8
Professional services .....	346.1	367.3	370.0	371.7	373.2	375.5	377.1	378.9	381.6	385.0	386.9	388.3	390.3	391.7
Other medical care services .....	488.0	517.0	521.6	523.9	527.4	530.8	533.6	546.4	546.4	550.8	556.5	555.9	559.2	564.2
<b>Entertainment .....</b>	<b>255.1</b>	<b>265.0</b>	<b>265.7</b>	<b>266.8</b>	<b>268.4</b>	<b>269.0</b>	<b>268.3</b>	<b>270.8</b>	<b>272.0</b>	<b>271.9</b>	<b>272.3</b>	<b>272.9</b>	<b>273.9</b>	<b>274.4</b>
Entertainment commodities .....	253.3	260.6	260.5	262.5	264.0	264.0	262.5	264.7	265.2	265.0	264.8	265.3	266.1	265.8
Entertainment services .....	258.3	271.8	273.6	273.3	275.2	276.6	277.1	279.9	282.1	282.2	283.5	284.2	285.5	287.0
<b>Other goods and services .....</b>	<b>307.7</b>	<b>326.6</b>	<b>326.0</b>	<b>333.3</b>	<b>334.9</b>	<b>335.3</b>	<b>336.5</b>	<b>339.1</b>	<b>340.3</b>	<b>341.1</b>	<b>341.8</b>	<b>342.1</b>	<b>342.6</b>	<b>344.9</b>
Tobacco products .....	310.0	328.5	331.5	332.8	334.4	334.7	337.4	342.7	344.7	345.6	346.5	346.5	347.1	354.3
Personal care .....	271.4	281.9	283.3	284.1	285.0	285.4	286.3	288.						

30. Continued— Consumer Price Index for All Urban Consumers: U.S. city average, by expenditure category and commodity or service group; and CPI for Urban Wage Earners and Clerical Workers, all items

(1967 = 100, unless otherwise indicated)

Series	Annual average		1985					1986						
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July
All items .....	311.1	322.2	323.5	324.5	325.5	326.6	327.4	328.4	327.5	326.0	325.3	326.3	327.9	328.0
Commodities .....	280.7	286.7	286.5	287.1	287.9	289.2	289.9	290.1	287.4	283.7	281.2	282.1	282.8	281.9
Food and beverages .....	295.1	302.0	301.8	302.1	302.5	303.6	305.6	307.9	307.7	307.8	308.5	309.4	309.5	312.2
Commodities less food and beverages .....	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nondurables less food and beverages .....	275.7	282.1	283.1	284.6	285.3	286.8	286.8	284.9	278.6	268.9	262.0	263.3	264.7	259.8
Apparel commodities .....	187.0	191.6	190.6	195.3	196.7	196.8	194.2	189.5	188.5	190.8	191.7	190.7	188.4	187.0
Nondurables less food, beverages, and apparel .....	325.8	333.3	335.4	335.3	335.6	337.8	339.1	338.7	329.5	313.6	302.6	305.2	308.4	301.7
Durables .....	266.5	270.7	268.6	268.7	270.2	271.5	271.4	271.4	270.5	269.7	269.2	269.6	269.9	269.6
Services .....	363.0	381.5	384.9	386.5	387.7	388.7	389.5	391.7	393.3	394.9	396.8	397.9	401.0	402.3
Rent of shelter .....	107.7	113.9	115.1	115.4	116.1	116.7	117.0	117.4	117.7	118.5	119.4	119.7	119.9	120.5
Household services less rent of shelter .....	108.1	111.2	113.2	113.5	112.1	110.8	110.8	111.4	111.8	111.6	111.6	112.3	115.2	114.9
Transportation services .....	321.1	337.0	337.4	337.1	341.1	344.7	346.1	349.0	351.0	352.4	352.3	353.4	355.3	357.1
Medical care services .....	410.3	435.1	438.6	440.5	443.0	445.8	448.0	451.9	456.2	460.1	462.3	464.2	466.8	469.8
Other services .....	296.0	314.1	313.8	319.7	321.4	322.5	322.9	324.8	326.1	326.6	327.6	328.2	329.2	330.1
Special indexes:														
All items less food .....	311.3	323.3	325.0	326.2	327.4	328.5	328.9	329.5	328.5	326.6	325.7	326.7	328.6	328.0
All items less shelter .....	295.1	303.9	304.6	305.7	306.3	307.2	307.9	308.8	307.4	305.2	303.6	304.7	306.5	306.1
All items less homeowners' costs .....	106.3	109.7	110.1	110.4	110.7	111.1	111.3	111.6	111.2	110.5	110.1	110.4	111.1	111.0
All items less medical care .....	307.3	317.7	318.9	319.9	320.8	321.9	322.6	323.4	322.2	320.5	319.7	320.6	322.2	322.1
Commodities less food .....	267.0	272.5	272.3	273.1	274.4	275.7	275.7	274.7	270.9	265.2	261.2	262.1	263.0	260.2
Nondurables less food .....	270.8	277.2	278.1	279.6	280.7	282.0	282.0	280.4	274.5	265.6	259.2	260.5	261.8	257.3
Nondurables less food and apparel .....	311.9	319.2	321.1	321.0	322.0	324.0	325.1	324.9	316.8	302.7	292.9	295.2	298.1	292.2
Nondurables .....	286.6	293.2	293.7	294.6	295.1	296.4	297.4	297.7	294.3	289.5	286.3	287.4	288.2	287.1
Services less rent of shelter .....	108.5	113.5	114.5	115.0	115.1	115.2	115.4	116.2	116.8	117.1	117.4	117.8	119.2	119.5
Services less medical care .....	355.6	373.3	376.7	378.3	379.3	380.1	380.8	382.7	384.0	385.4	387.2	388.3	391.3	392.5
Energy .....	423.6	426.5	433.8	432.6	427.1	425.1	426.5	424.7	408.9	381.3	361.8	367.6	380.6	366.5
All items less energy .....	302.9	314.8	315.6	316.8	318.4	319.8	320.5	321.8	322.3	323.3	324.4	325.0	325.5	326.9
All items less food and energy .....	301.2	314.4	315.3	316.9	318.9	320.4	321.6	322.3	323.3	323.6	324.8	325.3	325.9	326.9
Commodities less food and energy .....	253.1	259.7	258.8	260.2	262.0	262.7	262.2	261.8	261.6	262.0	262.1	262.2	262.0	262.0
Energy commodities .....	409.8	409.9	414.0	411.2	410.1	415.2	417.9	413.2	386.5	343.0	313.3	319.3	317.1	306.6
Services less energy .....	356.4	375.9	378.6	380.2	382.5	384.8	385.8	387.9	389.4	391.5	393.8	394.5	395.9	397.7
Purchasing power of the consumer dollar:														
1967 = \$1.00 .....	32.1	31.0	30.9	30.8	30.7	30.6	30.5	30.5	30.5	30.7	30.7	30.6	30.5	30.5
1957-59 = \$1.00 .....	27.6	26.7	26.6	26.5	26.4	26.3	26.3	26.2	26.3	26.4	26.4	26.4	26.2	26.2
<b>CONSUMER PRICE INDEX FOR URBAN WAGE EARNERS AND CLERICAL WORKERS:</b>														
All items .....	307.6	318.5	319.6	320.5	321.3	322.6	323.4	324.3	323.2	321.4	320.4	321.4	323.0	322.9
All items (1957-59 = 100) .....	357.7	370.4	371.8	372.7	373.7	375.1	376.1	377.1	375.8	373.7	372.6	373.7	375.6	375.5
Food and beverages .....	295.2	301.8	301.6	301.8	302.2	303.4	305.4	307.7	307.5	307.6	308.3	309.0	309.3	312.0
Food .....	302.7	309.3	309.1	309.3	309.3	310.6	312.8	315.1	314.9	315.0	315.6	316.4	316.6	319.5
Food at home .....	291.2	295.3	294.3	294.0	293.7	295.2	297.9	300.9	300.1	299.7	299.9	300.4	300.0	303.9
Cereals and bakery products .....	303.7	315.4	316.8	317.6	317.3	318.2	320.4	320.4	320.9	321.1	320.9	322.1	324.5	324.6
Meats, poultry, fish, and eggs .....	266.0	262.7	259.0	259.9	260.4	265.4	269.2	270.7	267.7	267.2	265.5	262.6	264.2	274.0
Dairy products .....	252.2	256.9	256.3	256.8	255.9	255.9	255.7	256.0	256.0	255.5	255.5	255.8	255.9	257.0
Fruits and vegetables .....	312.5	320.3	320.6	313.6	311.2	309.4	319.3	329.7	316.0	314.6	325.0	331.6	325.9	325.6
Other foods at home .....	352.7	361.5	362.2	362.9	363.4	362.5	361.6	366.1	375.2	375.6	376.0	374.3	373.9	373.4
Sugar and sweets .....	388.6	398.3	401.4	400.8	402.2	400.9	401.8	404.7	408.1	407.8	410.9	410.6	410.9	411.9
Fats and oils .....	287.5	293.9	296.5	294.1	290.6	291.8	289.6	291.6	290.8	289.7	287.8	286.6	286.4	286.6
Nonalcoholic beverages .....	444.4	453.2	451.2	454.1	455.6	453.1	450.4	461.0	485.5	487.4	487.0	481.2	479.5	477.6
Other prepared foods .....	286.4	295.7	297.3	297.7	298.3	298.3	298.7	299.4	300.9	300.7	301.6	302.7	303.0	303.1
Food away from home .....	336.7	349.7	351.5	353.0	353.4	354.4	355.2	356.2	357.3	358.6	360.2	362.0	363.5	364.2
Alcoholic beverages .....	225.3	232.6	232.2	232.6	239.1	238.8	239.1	240.1	240.9	241.4	242.3	242.2	242.9	243.4
Housing .....	329.2	343.3	346.2	347.2	347.5	348.3	349.1	350.1	349.7	350.1	351.1	351.6	354.3	354.5
Shelter .....	350.0	370.4	374.0	375.0	377.1	379.3	380.4	381.8	382.9	385.0	388.1	388.8	389.4	391.5
Renters' costs (12/84 = 100) .....	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rent, residential .....	248.6	263.7	265.7	266.8	268.9	270.7	271.5	272.5	272.8	274.1	277.0	277.5	278.5	280.3
Other renters' costs .....	372.4	397.9	409.6	409.8	411.6	408.0	397.5	400.8	403.5	405.4	411.6	411.3	415.5	420.4
Homeowners' costs (12/84 = 100) .....	-	103.1	104.1	104.3	104.8	105.5	105.9	106.3	106.6	107.4	108.1	108.3	108.4	108.8
Owners' equivalent rent (12/84 = 100) .....	-	103.0	104.1	104.3	104.8	105.5	105.9	106.3	106.6	107.3	108.1	108.3	108.4	108.8
Household insurance (12/84 = 100) .....	-	103.2	103.7	104.3	105.2	105.2	105.7	106.3	107.8	108.2	108.5	109.0	109.1	110.1
Maintenance and repairs .....	356.3	364.1	365.6	364.4	364.6	367.7	368.5	373.2	374.0	364.7	364.6	363.8	363.2	366.7
Maintenance and repair services .....	403.5	415.0	419.6	416.8	417.4	420.9	420.1	426.2	426.5	416.6	419.2	420.0	422.6	425.2
Maintenance and repair commodities .....	257.2	261.1	260.6	260.5	260.5	262.7	264.2	267.2	268.1	261.1	259.4	258.0	255.7	259.0
Fuel and other utilities .....	388.6	394.7	400.1	401.9	396.3	392.3	394.3	395.6	390.9	386.3	382.6	383.0	394.9	390.3
Fuels .....	485.0	487.5	494.0	496.7	487.2	481.0	483.1	484.1	475.7	467.1	459.1	459.7	477.3	469.1
Fuel oil, coal, and bottled gas .....	644.3	622.0	596.9	604.3	618.1	644.3	659.9	652.7	593.6	552.8	521.5	499.9	489.9	462.9
Gas (piped) and electricity .....	444.1	451.6	464.2	465.9	452.0	439.5	438.8	441.4	443.2	441.2	438.0	443.0	465.7	461.4
Other utilities and public services .....	231.2	241.6	245.1	245.6	245.7	246.8	246.7	248.3	248.8	249.9	252.1	252.2	255.8	256.3
Household furnishings and operations .....	239.1	243.4	243.1	243.2	244.5	245.1	245.2	245.1	245.3	246.0	246.0	246.1	246.2	246.5
Housefurnishings .....	197.0	197.6	196.6	196.5	197.7	198.3	197.8	197.3	197.2	198.5	198.1	198.4	198.2	198.4
Housekeeping supplies .....	300.2	310.7	310.4	311.0	312.7	313.5	315.0	315.8	316.4	315.5	316.3	315.7	316.8	317.1
Housekeeping services .....	328.0	340.2	342.2	342.9	343.9	344.5	345.0	345.6	346.3	346.6	347.1	347.4	347.8	348.4
Apparel and upkeep .....	199.1	205.0	204.3	208.7	210.2	210.2	208.1							

**30. Continued— Consumer Price Index for All Urban Consumers: U.S. city average, by expenditure category and commodity or service group; and CPI for Urban Wage Earners and Clerical Workers, all items**

(1967=100, unless otherwise indicated)

Series	Annual average		1985						1986						
	1984	1985	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	
Apparel commodities	186.6	191.3	190.4	195.1	196.6	196.5	194.1	189.4	188.2	190.4	191.2	190.1	187.7	186.3	
Men's and boys' apparel	192.9	198.2	197.3	201.8	203.5	203.7	202.2	198.8	196.8	198.0	199.3	200.0	198.0	195.4	
Women's and girls' apparel	165.0	171.3	169.9	178.2	180.0	178.3	174.5	166.1	165.2	169.0	169.3	165.9	162.0	160.8	
Infants' and toddlers' apparel	297.6	311.7	311.2	314.9	314.8	320.7	317.3	332.7	328.6	329.6	331.3	334.3	335.6	323.7	
Footwear	210.0	212.5	210.5	211.0	212.6	215.9	213.6	209.9	208.4	210.7	212.1	212.0	210.6	209.6	
Other apparel commodities	204.5	203.1	205.2	202.5	202.4	202.5	202.4	203.5	204.2	203.5	204.1	203.8	204.5	206.5	
Apparel services	302.9	318.5	320.5	321.6	323.2	323.6	324.4	327.2	328.1	329.0	330.2	330.9	331.9	332.2	
Transportation	313.9	321.6	322.3	321.1	322.2	324.6	325.3	325.1	320.1	310.3	303.5	305.9	308.7	304.6	
Private transportation	310.1	317.4	318.0	316.6	317.6	320.1	320.8	320.2	314.8	304.5	297.4	299.9	302.8	298.3	
New vehicles	207.3	214.2	213.5	213.5	215.3	217.5	218.6	219.0	219.4	219.4	220.2	222.0	223.2	223.7	
New cars	207.9	214.5	213.9	213.8	215.5	217.8	218.8	219.2	219.7	219.5	220.4	222.3	223.4	223.9	
Used cars	375.7	379.7	374.0	374.3	375.3	376.4	375.6	374.1	370.7	367.2	364.8	363.6	362.5	360.3	
Motor fuel	372.2	375.4	383.8	379.5	376.3	378.7	379.6	375.3	353.0	309.6	280.1	290.3	300.6	280.9	
Gasoline	371.8	375.0	383.7	379.2	375.8	378.1	378.9	374.6	352.3	308.8	279.1	289.6	300.3	280.5	
Maintenance and repair	342.2	352.6	352.9	354.5	356.9	357.2	359.0	359.4	360.4	360.9	362.2	362.8	363.6	365.0	
Other private transportation	274.2	287.7	287.6	285.2	289.2	293.7	294.7	296.9	298.4	300.6	300.4	299.8	301.2	302.4	
Other private transportation commodities	203.9	204.7	204.9	205.6	205.0	203.7	204.3	205.6	205.4	206.0	204.6	204.9	203.9	203.8	
Other private transportation services	295.4	312.3	312.1	308.9	314.1	320.2	321.3	323.7	328.3	328.5	328.5	327.7	329.6	331.2	
Public transportation	376.8	391.7	393.5	396.8	399.3	400.1	400.2	408.6	412.6	412.0	413.0	413.8	415.1	418.0	
Medical care	377.7	401.2	404.5	406.3	408.5	410.9	412.6	416.0	420.0	423.5	425.7	427.3	429.6	432.4	
Medical care commodities	239.7	256.3	259.0	259.8	260.9	262.2	262.3	264.1	267.0	268.8	270.7	271.7	272.5	274.6	
Medical care services	407.9	432.7	436.1	438.1	440.6	443.2	445.4	449.2	453.5	457.3	459.5	461.3	464.0	466.9	
Professional services	346.5	367.7	370.4	372.1	373.7	375.8	377.6	379.3	382.2	385.6	387.4	388.8	390.8	392.3	
Other medical care services	484.7	513.9	518.4	520.7	524.4	527.5	530.4	536.9	543.0	547.3	550.0	552.3	555.8	560.7	
Entertainment	251.2	260.1	260.8	261.6	263.0	263.7	263.0	265.4	266.5	266.5	266.9	267.3	268.4	269.0	
Entertainment commodities	247.7	254.2	254.3	256.0	257.1	257.2	255.7	257.8	258.3	258.3	258.4	258.7	259.8	259.6	
Entertainment services	258.5	271.6	273.3	272.6	274.6	276.3	276.8	280.0	282.0	282.1	283.0	283.6	284.8	286.5	
Other goods and services	304.9	322.7	322.9	328.7	330.1	330.5	331.9	334.9	336.1	337.0	337.6	338.0	338.4	341.2	
Tobacco products	309.7	328.1	331.1	332.4	334.0	334.3	337.1	342.4	344.4	345.2	346.0	347.6	346.7	354.0	
Personal care	269.4	279.6	280.9	281.8	282.7	283.1	284.0	285.9	286.8	288.0	288.2	288.6	288.6	288.8	
Toilet goods and personal care appliances	270.3	279.0	280.0	281.1	282.0	281.9	283.3	285.9	286.7	288.1	288.4	288.6	287.6	287.8	
Personal care services	268.8	280.5	282.2	282.8	283.7	284.8	285.2	286.4	287.4	288.4	288.4	289.0	290.0	290.2	
Personal and educational expenses	368.2	399.3	393.2	414.5	416.5	417.3	417.4	418.9	419.9	420.1	421.2	422.0	422.9	423.8	
School books and supplies	327.5	355.7	351.2	366.9	369.2	369.3	369.4	375.6	378.4	379.0	379.1	379.1	380.2	380.5	
Personal and educational services	378.2	410.1	403.6	426.1	428.1	428.9	429.1	429.7	430.3	430.5	431.8	432.8	433.6	434.6	
All items	307.6	318.5	319.6	320.5	321.3	322.6	323.4	324.3	323.2	321.4	320.4	321.4	323.0	322.9	
Commodities	280.4	286.5	286.3	286.8	287.6	288.9	289.8	289.8	287.0	283.1	280.4	281.3	282.0	281.1	
Food and beverages	295.2	301.8	301.6	301.8	302.2	303.4	305.4	307.7	307.5	307.6	308.3	309.0	309.3	312.0	
Commodities less food and beverages	269.3	-	-	-	-	-	-	-	-	-	-	-	-	-	
Nondurables less food and beverages	277.5	283.8	285.1	286.5	287.0	288.5	288.7	286.9	280.1	269.6	262.0	263.6	265.2	260.1	
Apparel commodities	186.6	191.3	190.4	195.1	196.6	196.5	194.1	189.4	188.2	190.4	191.2	190.1	187.7	186.3	
Nondurables less food, beverages, and apparel	327.0	334.2	336.6	336.4	336.5	338.8	340.1	339.6	330.1	313.2	301.6	304.5	308.0	301.0	
Durables	261.1	265.2	263.1	263.1	264.5	265.7	265.7	265.6	264.6	263.7	263.3	263.5	263.6	263.2	
Services	358.0	377.3	380.7	382.0	383.0	384.2	385.1	387.2	388.8	390.5	392.2	393.2	396.4	397.7	
Rent of shelter (12/84=100)	-	103.2	104.3	104.5	105.1	105.8	106.1	106.4	106.7	107.4	108.3	108.5	108.7	109.2	
Household services less rent of shelter (12/84=100)	-	102.6	104.6	104.8	103.3	102.1	102.0	102.6	103.0	102.8	102.7	103.4	106.4	106.0	
Transportation services	317.2	332.2	332.4	331.4	335.5	339.3	340.5	343.3	345.4	347.0	347.5	347.3	348.9	350.6	
Medical care services	407.9	432.7	436.1	438.1	440.6	443.2	445.4	449.2	453.5	457.3	459.5	461.3	464.0	466.9	
Other services	292.9	310.1	310.1	315.0	316.7	317.8	318.3	320.4	321.6	322.1	322.9	323.6	324.6	325.6	
Special indexes:															
All items less food	307.5	319.4	320.9	321.9	322.9	324.2	324.6	325.1	323.8	321.5	320.2	321.2	323.2	322.3	
All items less shelter	295.1	303.4	304.0	304.8	305.4	306.4	307.2	307.9	306.4	303.8	302.1	303.0	304.8	304.3	
All items less homeowners' costs (12/84=100)	-	101.8	102.1	102.4	102.6	103.0	103.2	103.5	103.0	102.3	101.8	102.1	102.7	102.6	
All items less medical care	304.0	314.3	315.3	316.1	316.9	318.1	318.9	319.6	318.3	316.2	315.2	316.1	317.7	317.4	
Commodities less food	267.1	272.8	272.7	273.4	274.5	275.9	275.9	275.0	270.9	264.9	260.7	261.6	262.6	259.6	
Nondurables less food	272.6	279.0	280.2	281.5	282.4	283.8	283.9	282.3	276.1	266.4	259.4	260.9	262.4	257.7	
Nondurables less food and apparel	313.2	320.3	322.4	322.3	323.1	325.0	326.3	325.9	317.5	302.6	292.2	294.9	298.0	291.8	
Nondurables	287.4	293.9	294.5	295.2	295.7	297.1	298.2	298.4	295.0	289.8	286.3	287.5	288.4	287.2	
Services less rent of shelter (12/84=100)	-	102.6	103.5	103.8	103.9	103.9	104.2	104.9	105.5	105.7	105.9	106.2	107.6	107.8	
Services less medical care	350.5	369.0	372.5	373.6	374.5	375.5	376.2	378.2	379.5	381.0	382.7	383.6	386.8	387.9	
Energy	423.3	426.3	433.9	432.5	426.6	425.4	426.8	424.7	408.1	379.0	358.4	364.6	378.1	363.1	
All items less energy	298.3	309.9	310.4	311.5	313.0	314.5	315.3	316.5	316.9	317.8	318.8	319.2	319.7	321.1	
All items less food and energy	295.8	308.7	309.4	310.7	312.7	314.2	314.6	315.4	316.1	317.2	318.3	318.6	319.1	320.1	
Commodities less food and energy	250.5	256.8	255.8	257.2	258.8	259.5	259.2	258.8	258.5	258.7	258.8	258.8	258.5	258.5	
Energy commodities	410.5	410.9	415.7	412.6	411.2	416.3	418.9	414.1	387.3	343.3	312.9	319.8	328.1	307.2	
Services less energy	350.8	371.1	373.7	374.9	377.3	379.8	380.8	382.9	384.5	386.5	388.8	389.4	390.8	392.6	
Purchasing power of the consumer dollar:															
1967=\$1.00	32.5	31.4	31.3	31.2	31.1	31.0	30.9	30.8	30.9	31.1	31.2	31.1	31.0	31.0	
1957-59=\$1.00	28.0	27.0	26.9	26.8	26.8	26.7	26.6	26.5	26.6	26.8	26.8	26.8	26.6	26.6	

- Data not available.

## 31. Consumer Price Index: U.S. city average and available local area data: all items

(1967 = 100, unless otherwise indicated)

Area <sup>1</sup>	Pricing schedule <sup>2</sup>	Other index base	All Urban Consumers							Urban Wage Earners						
			1985		1986					1985		1986				
			July	Aug.	Mar.	Apr.	May	June	July	July	Aug.	Mar.	Apr.	May	June	July
U.S. city average .....		-	322.8	323.5	326.0	325.3	326.3	327.9	328.0	319.1	319.6	321.4	320.4	321.4	323.0	322.9
Chicago, Ill.-Northwestern																
Ind. ....	M	-	324.4	325.9	323.9	323.7	324.2	330.4	331.1	311.1	312.1	309.7	309.1	309.6	315.6	316.0
Detroit, Mich. ....	M	-	318.0	318.0	320.0	318.8	321.7	321.0	318.4	308.3	308.3	309.3	308.1	311.0	310.2	307.5
Los Angeles-Long Beach, Anaheim, Calif. ....	M	-	321.3	323.9	328.2	326.8	329.4	331.3	330.9	315.8	318.0	321.6	320.2	322.7	324.5	323.8
New York, N.Y.-Northeastern																
N.J. ....	M	-	313.5	315.7	322.4	321.4	320.6	322.8	325.1	306.5	308.5	314.5	313.2	312.3	314.4	316.5
Philadelphia, Pa.-N.J. ....	M	-	315.5	315.8	319.1	317.8	318.9	321.7	323.0	318.6	318.5	321.4	319.7	320.8	323.5	324.6
Anchorage, Alaska (10/67 = 100) .....	1	10/67	283.1	-	291.2	-	288.9	-	284.1	276.0	-	284.4	-	281.8	-	276.9
Baltimore, Md. ....	1	-	324.0	-	331.1	-	329.1	-	330.2	323.4	-	329.5	-	326.8	-	327.9
Boston, Mass. ....	1	-	317.7	-	324.9	-	322.6	-	323.6	315.7	-	322.3	-	319.3	-	320.8
Cincinnati, Ohio-Ky.-Ind. ....	1	-	330.0	-	329.4	-	332.0	-	332.4	323.2	-	321.8	-	324.8	-	324.9
Denver-Boulder, Colo. ....	1	-	360.3	-	355.7	-	356.3	-	358.4	355.9	-	350.1	-	350.3	-	352.4
Miami, Fla. (11/77 = 100) .....	1	11/77	171.4	-	174.5	-	173.0	-	171.2	172.7	-	175.1	-	173.4	-	171.6
Milwaukee, Wis. ....	1	-	331.1	-	329.1	-	332.0	-	331.3	350.4	-	347.2	-	350.6	-	350.1
Northeast, Pa. ....	1	-	306.6	-	309.3	-	309.2	-	309.0	305.7	-	308.3	-	308.1	-	307.8
Portland, Oreg.-Wash. ....	1	-	312.9	-	315.0	-	314.6	-	314.7	303.2	-	304.3	-	303.2	-	303.4
St. Louis, Mo.-Ill. ....	1	-	319.9	-	319.2	-	318.6	-	325.6	316.6	-	315.0	-	314.2	-	320.6
San Diego, Calif. ....	1	-	372.8	-	379.2	-	382.8	-	383.1	336.9	-	341.9	-	345.2	-	345.0
Seattle-Everett, Wash. ....	1	-	322.0	-	325.0	-	323.5	-	323.7	309.1	-	311.4	-	309.4	-	310.1
Washington, D.C.-Md.-Va. ....	1	-	323.3	-	329.1	-	329.6	-	329.3	325.9	-	330.5	-	330.2	-	330.2
Alanta, Ga. ....	2	-	-	331.4	-	334.9	-	338.5	-	-	329.3	-	331.7	-	335.5	-
Buffalo, N.Y. ....	2	-	-	306.5	-	308.0	-	308.9	-	-	292.9	-	292.7	-	294.0	-
Cleveland, Ohio ....	2	-	-	348.1	-	346.9	-	350.6	-	-	327.0	-	324.4	-	328.2	-
Dallas-Ft. Worth, Tex. ....	2	-	-	343.4	-	341.4	-	344.7	-	-	337.0	-	334.1	-	337.4	-
Honolulu, Hawaii ....	2	-	-	294.2	-	299.0	-	299.2	-	-	301.3	-	306.0	-	306.5	-
Houston, Tex. ....	2	-	-	338.2	-	330.0	-	333.3	-	-	335.3	-	327.7	-	330.9	-
Kansas City, Mo.-Kansas ....	2	-	-	321.1	-	320.7	-	322.9	-	-	311.2	-	308.9	-	311.4	-
Minneapolis-St. Paul, Minn.-Wis. ....	2	-	-	338.8	-	338.4	-	342.1	-	-	334.4	-	332.3	-	336.2	-
Pittsburgh, Pa. ....	2	-	-	325.9	-	328.1	-	328.6	-	-	308.0	-	307.8	-	308.3	-
San Francisco-Oakland, Calif. ....	2	-	-	335.8	-	339.3	-	344.0	-	-	330.8	-	333.2	-	338.1	-
Region <sup>3</sup>																
Northeast .....	2	12/77	-	171.0	-	173.7	-	174.2	-	-	169.0	-	171.1	-	171.6	-
North Central .....	2	12/77	-	174.3	-	173.9	-	176.1	-	-	171.0	-	170.0	-	172.2	-
South .....	2	12/77	-	174.5	-	175.1	-	176.3	-	-	174.3	-	174.1	-	175.2	-
West .....	2	12/77	-	175.9	-	176.8	-	178.7	-	-	173.9	-	174.5	-	176.3	-
Population size class <sup>3</sup>																
A-1 .....	2	12/77	-	172.3	-	173.9	-	175.7	-	-	168.3	-	169.3	-	171.0	-
A-2 .....	2	12/77	-	176.6	-	177.4	-	178.9	-	-	173.7	-	173.8	-	175.2	-
B .....	2	12/77	-	174.9	-	175.6	-	177.0	-	-	172.4	-	172.7	-	174.1	-
C .....	2	12/77	-	172.5	-	173.4	-	174.7	-	-	173.0	-	173.4	-	174.6	-
D .....	2	12/77	-	172.3	-	172.7	-	173.4	-	-	173.8	-	173.6	-	174.2	-
Region/population size class cross classification <sup>3</sup>																
Class A:																
Northeast .....	2	12/77	-	168.5	-	171.0	-	171.8	-	-	165.0	-	166.9	-	167.7	-
North Central .....	2	12/77	-	178.3	-	177.8	-	180.3	-	-	173.3	-	172.1	-	174.7	-
South .....	2	12/77	-	174.8	-	175.5	-	176.8	-	-	174.9	-	174.9	-	176.1	-
West .....	2	11/77	-	178.0	-	179.6	-	181.8	-	-	173.8	-	174.9	-	177.1	-
Class B:																
Northeast .....	2	12/77	-	173.3	-	174.7	-	175.2	-	-	170.4	-	171.7	-	172.2	-
North Central .....	2	12/77	-	171.5	-	172.1	-	174.1	-	-	168.0	-	167.7	-	169.7	-
South .....	2	12/77	-	176.0	-	177.0	-	178.5	-	-	172.7	-	173.2	-	174.6	-
West .....	2	12/77	-	176.9	-	176.7	-	178.3	-	-	177.5	-	177.1	-	178.7	-

See footnotes at end of table.

### 31. Continued— Consumer Price Index: U.S. city average and available local area data: all items

(1967=100, unless otherwise indicated)

Area <sup>1</sup>	Pricing schedule <sup>2</sup>	Other index base	All Urban Consumers							Urban Wage Earners						
			1985		1986					1985		1986				
			July	Aug.	Mar.	Apr.	May	June	July	July	Aug.	Mar.	Apr.	May	June	July
<b>Class C:</b>																
Northeast .....	2	12/77	-	178.9	-	183.0	-	183.4	-	-	183.8	-	187.4	-	187.8	-
North Central .....	2	12/77	-	169.1	-	168.5	-	170.7	-	-	166.0	-	165.1	-	167.2	-
South .....	2	12/77	-	173.5	-	173.6	-	174.5	-	-	175.1	-	174.3	-	175.2	-
West .....	2	12/77	-	168.9	-	170.5	-	171.6	-	-	167.7	-	168.9	-	169.9	-
<b>Class D:</b>																
Northeast .....	2	12/77	-	173.7	-	177.9	-	176.1	-	-	173.6	-	177.2	-	175.5	-
North Central .....	2	12/77	-	170.7	-	170.0	-	171.3	-	-	172.7	-	171.4	-	172.6	-
South .....	2	12/77	-	172.8	-	173.2	-	173.9	-	-	174.5	-	174.0	-	174.6	-
West .....	2	12/77	-	173.3	-	172.6	-	174.1	-	-	174.8	-	173.9	-	175.4	-

<sup>1</sup> Area is generally the Standard Metropolitan Statistical Area (SMSA), exclusive of farms. L.A.-Long Beach, Anaheim, Calif. is a combination of two SMSA's, and N.Y., N.Y.-Northeastern N.J. and Chicago, Ill.-Northwestern Ind. are the more extensive Standard Consolidated Areas. Area definitions are those established by the Office of Management and Budget in 1973, except for Denver-Boulder, Colo. which does not include Douglas County. Definitions do not include revisions made since 1973.

<sup>2</sup> Foods, fuels, and several other items priced every month in all areas; most other goods and services priced as indicated:

M - Every month.

1 - January, March, May, July, September, and November.

2 - February, April, June, August, October, and December.

<sup>3</sup> Regions are defined as the four Census regions.

The population size classes are aggregations of areas which have urban population as defined:

A-1 - More than 4,000,000.

A-2 - 1,250,000 to 4,000,000.

B - 385,000 to 1,250,000

C - 75,000 to 385,000.

D - Less than 75,000.

Population size class A is the aggregation of population size classes A-1 and A-2.

- Data not available.

NOTE: Local area CPI indexes are byproducts of the national CPI program. Because each local index is a small subset of the national index, it has a smaller sample size and is, therefore, subject to substantially more sampling and other measurement error than the national index. As a result, local area indexes show greater volatility than the national index, although their long-term trends are quite similar. Therefore, the Bureau of Labor Statistics strongly urges users to consider adopting the national average CPI for use in escalator clauses.

### 32. Annual data: Consumer Price Index all items and major groups

Series	1977	1978	1979	1980	1981	1982	1983	1984	1985
<b>Consumer Price Index for All Urban Consumers:</b>									
All items:									
Index .....	181.5	195.4	217.4	246.8	272.4	289.1	298.4	311.1	322.2
Percent change .....	6.5	7.7	11.3	13.5	10.4	6.1	3.2	4.3	3.6
Food and beverages:									
Index .....	188.0	206.3	228.5	248.0	267.3	278.2	284.4	295.1	302.0
Percent change .....	6.0	9.7	10.8	8.5	7.8	4.1	2.2	3.8	2.3
Housing:									
Index .....	186.5	202.8	227.6	263.3	293.5	314.7	323.1	336.5	349.9
Percent change .....	6.8	8.7	12.2	15.7	11.5	7.2	2.7	4.1	4.0
Apparel and upkeep:									
Index .....	154.2	159.6	166.6	178.4	186.9	191.8	196.5	200.2	206.0
Percent change .....	4.5	3.5	4.4	7.1	4.8	2.6	2.5	1.9	2.9
Transportation:									
Index .....	177.2	185.5	212.0	249.7	280.0	291.5	298.4	311.7	319.9
Percent change .....	7.1	4.7	14.3	17.8	12.1	4.1	2.4	4.5	2.6
Medical care:									
Index .....	202.4	219.4	239.7	265.9	294.5	328.7	357.3	379.5	403.1
Percent change .....	9.6	8.4	9.3	10.9	10.8	11.6	8.7	6.2	6.2
Entertainment:									
Index .....	167.7	176.6	188.5	205.3	221.4	235.8	246.0	255.1	265.0
Percent change .....	4.9	5.3	6.7	8.9	7.8	6.5	4.3	3.7	3.9
Other goods and services:									
Index .....	172.2	183.3	196.7	214.5	235.7	259.9	288.3	307.7	326.6
Percent change .....	5.8	6.4	7.3	9.0	9.9	10.3	10.9	6.7	6.1
<b>Consumer Price Index for Urban Wage Earners and Clerical Workers</b>									
All items:									
Index .....	181.5	195.3	217.7	247.0	272.3	288.6	297.4	307.6	318.5
Percent change .....	6.5	7.6	11.5	13.5	10.2	6.0	3.0	3.4	3.5

## 33. Producer Price Indexes, by stage of processing

(1967 = 100)

Grouping	Annual average		1985				1986							
	1984	1985	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
<b>Finished goods</b> .....	291.1	293.7	290.0	294.7	296.4	297.2	296.0	291.9	288.0	287.2	289.0	288.9	288.0	288.3
Finished consumer goods .....	290.3	291.8	288.2	292.3	294.4	295.4	293.8	288.4	283.4	281.9	284.2	284.1	282.7	283.1
Finished consumer goods excluding foods .....	273.3	271.2	265.7	268.2	271.8	275.0	275.0	272.0	271.6	271.9	274.9	275.1	280.7	283.6
Nondurable goods less food .....	294.1	297.3	294.7	299.4	300.7	300.7	298.3	291.8	284.6	282.2	284.1	283.8	278.8	278.0
Durable goods .....	337.3	339.3	340.3	340.3	342.6	343.2	339.6	328.0	315.4	309.8	312.9	312.6	303.4	302.0
Capital equipment .....	236.8	241.5	234.5	244.9	245.0	244.3	243.5	243.9	243.7	245.7	245.8	245.8	246.3	246.2
Capital equipment .....	294.0	300.5	296.3	303.5	303.8	303.7	303.9	304.3	304.3	305.6	305.8	305.8	306.4	306.3
<b>Intermediate materials, supplies, and components</b> .....	320.0	318.7	317.7	317.6	318.1	318.9	317.4	313.5	309.5	307.1	306.8	307.1	305.0	304.5
Materials and components for manufacturing .....	301.8	299.5	298.4	298.0	297.7	297.9	297.1	296.5	296.4	295.5	295.3	295.3	295.8	296.0
Materials for food manufacturing .....	271.1	258.8	249.9	252.3	254.0	254.3	252.8	249.2	246.7	244.8	248.6	247.8	251.6	255.7
Materials for nondurable manufacturing .....	290.5	285.9	285.1	283.3	282.8	283.1	283.8	282.4	282.5	279.3	278.0	278.0	278.2	277.2
Materials for durable manufacturing .....	325.1	320.2	319.2	318.6	317.5	317.6	313.4	313.1	313.6	313.7	313.2	313.3	313.3	313.4
Components for manufacturing .....	287.5	291.5	292.1	292.3	292.3	292.4	293.1	293.6	293.7	294.1	294.1	294.2	294.6	294.9
Materials and components for construction .....	310.3	315.2	315.6	315.5	315.0	315.7	316.2	316.5	317.0	318.3	318.3	317.7	318.0	317.6
Processed fuels and lubricants .....	566.2	548.9	542.4	542.6	550.5	557.2	540.8	500.8	453.4	428.5	425.7	429.3	401.6	395.2
Containers .....	302.3	311.2	309.9	310.4	309.8	310.6	311.2	310.9	312.3	312.8	313.9	313.6	314.2	316.4
Supplies .....	283.4	284.2	284.5	285.1	285.6	285.7	286.6	286.4	286.8	287.2	287.2	287.3	287.4	287.1
<b>Crude materials for further processing</b> .....	330.8	306.1	291.8	297.8	304.7	304.3	301.0	289.0	281.1	273.7	278.9	274.9	278.0	275.5
Foodstuffs and feedstuffs .....	259.5	235.0	215.4	224.6	236.6	236.8	231.7	227.2	224.4	220.3	228.9	226.1	233.6	236.3
Nonfood materials <sup>1</sup> .....	380.5	355.3	352.2	352.8	352.0	351.6	352.4	321.8	290.5	278.8	278.8	279.4	272.4	259.4
<b>Special groupings</b>														
Finished goods, excluding foods .....	294.8	299.0	295.9	301.3	302.4	302.4	300.7	296.3	291.2	289.9	291.3	291.1	287.8	287.2
Finished energy goods .....	750.3	720.9	718.2	716.5	729.5	733.8	700.9	629.3	554.1	517.2	532.7	531.5	467.8	459.1
Finished goods less energy .....	265.1	269.2	265.5	270.5	271.6	272.2	272.7	272.2	272.1	273.1	274.2	274.2	276.4	277.2
Finished consumer goods less energy .....	257.8	261.3	257.7	262.1	263.4	264.3	264.8	264.0	263.9	264.9	266.2	266.2	269.0	270.0
Finished goods less food and energy .....	262.3	268.7	265.7	271.6	271.8	271.4	272.1	272.5	272.5	273.9	274.2	274.1	275.0	275.0
Finished consumer goods less food and energy .....	245.9	252.1	249.6	254.9	255.0	254.6	255.5	256.0	256.0	257.3	257.7	257.6	258.6	258.6
Consumer nondurable goods less food and energy .....	239.0	246.2	247.9	248.3	248.5	248.3	250.5	251.1	251.2	252.0	252.5	252.3	253.8	253.8
Intermediate materials less foods and feeds .....	325.0	325.0	324.4	324.1	324.5	325.3	323.6	319.7	315.5	313.0	312.5	312.8	310.5	309.9
Intermediate foods and feeds .....	253.1	232.8	225.4	228.6	231.4	232.7	232.6	228.9	227.8	227.0	229.4	229.0	230.3	232.4
Intermediate energy goods .....	545.0	528.3	522.3	522.2	529.3	536.2	520.0	482.0	437.0	413.3	410.5	413.9	387.1	380.8
Intermediate goods less energy .....	303.8	304.0	303.4	303.4	303.2	303.5	303.4	303.0	303.3	303.1	303.0	302.9	303.4	303.5
Intermediate materials less foods and energy .....	303.6	305.2	305.0	304.6	304.2	304.5	304.3	304.2	304.5	304.3	304.0	303.9	304.2	304.2
Crude energy materials .....	785.2	748.1	743.2	743.1	737.1	735.6	732.8	662.9	614.5	577.0	571.6	554.2	538.7	524.5
Crude materials less energy .....	255.5	233.2	217.9	224.7	233.2	233.0	229.8	226.5	224.7	221.9	228.5	226.5	232.0	231.1
Crude nonfood materials less energy .....	266.1	249.7	246.7	246.5	244.6	242.9	245.8	246.5	247.9	249.1	249.3	250.0	249.2	236.1

<sup>1</sup> Crude nonfood materials except fuel.

### 34. Producer Price indexes, by durability of product

(1967 = 100)

Grouping	Annual average		1985				1986							
	1984	1985	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.
Total durable goods .....	293.6	297.3	295.2	298.8	298.5	298.5	298.1	298.4	298.6	299.7	299.7	299.6	300.0	300.1
Total nondurable goods .....	323.3	317.2	313.0	314.3	317.6	318.8	316.8	308.4	300.7	296.0	297.9	297.4	294.9	294.0
<b>Total manufactures .....</b>	<b>302.9</b>	<b>304.3</b>	<b>302.2</b>	<b>304.4</b>	<b>305.4</b>	<b>306.0</b>	<b>304.8</b>	<b>301.1</b>	<b>297.3</b>	<b>296.1</b>	<b>296.9</b>	<b>297.0</b>	<b>295.4</b>	<b>295.6</b>
Durable .....	293.9	298.1	296.0	298.7	299.5	299.5	299.0	299.3	299.4	300.5	300.5	300.5	300.9	300.9
Nondurable .....	312.3	310.5	308.4	309.2	311.4	312.5	310.6	302.9	294.9	291.2	292.8	293.1	289.2	289.7
<b>Total raw or slightly processed goods .....</b>	<b>346.6</b>	<b>327.9</b>	<b>317.6</b>	<b>320.6</b>	<b>326.2</b>	<b>327.6</b>	<b>326.0</b>	<b>316.3</b>	<b>310.3</b>	<b>303.0</b>	<b>305.6</b>	<b>302.6</b>	<b>304.3</b>	<b>299.7</b>
Durable .....	266.7	252.2	249.7	248.1	245.2	244.3	248.2	251.2	252.4	253.1	252.0	250.9	248.9	252.4
Nondurable .....	351.4	332.4	321.6	324.9	331.2	332.7	330.6	320.2	313.6	305.8	308.7	305.5	307.4	302.3

### 35. Annual data: Producer Price Indexes, by stage of processing

(1967 = 100)

Index	1977	1978	1979	1980	1981	1982	1983	1984	1985
<b>Finished goods:</b>									
Total .....	181.7	195.9	217.7	247.0	269.8	280.7	285.2	291.1	293.7
Consumer goods .....	180.7	194.9	217.9	248.9	271.3	281.0	284.6	290.3	291.8
Capital equipment .....	184.6	199.2	216.5	239.8	264.3	279.4	287.2	294.0	300.5
<b>Intermediate materials, supplies, and components:</b>									
Total .....	201.5	215.6	243.2	280.3	306.0	310.4	312.3	320.0	318.7
Materials and components for manufacturing .....	195.4	208.7	234.4	265.7	286.1	289.8	293.4	301.8	299.5
Materials and components for construction .....	203.4	224.7	247.4	268.3	287.6	293.7	301.8	310.3	315.2
Processed fuels and lubricants .....	282.5	295.3	364.8	503.0	595.4	591.7	564.8	566.2	548.9
Containers .....	188.3	202.8	226.8	254.5	276.1	285.6	286.6	302.3	311.2
Supplies .....	188.7	198.5	218.2	244.5	263.8	272.1	277.1	283.4	284.2
<b>Crude materials for further processing:</b>									
Total .....	209.2	234.4	274.3	304.6	329.0	319.5	323.6	330.8	306.1
Foodstuffs and feedstuffs .....	192.1	216.2	247.9	259.2	257.4	247.8	252.2	259.5	235.0
Nonfood materials except fuel .....	212.2	233.1	284.5	346.1	413.7	376.8	372.2	380.5	355.3
Fuel .....	372.1	426.8	507.6	615.0	751.2	886.1	931.5	931.3	909.6

**36. U.S. export price indexes by Standard International Trade Classification**

(June 1977 = 100, unless otherwise indicated)

Category	1974 SITC	1983	1984				1985				1986	
		Dec.	Mar.	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
<b>ALL COMMODITIES (9/83=100)</b> .....		99.5	100.2	101.5	99.3	98.1	97.5	97.5	96.5	96.7	97.0	96.7
<b>Food (3/83=100)</b> .....	0	108.8	106.2	109.6	103.5	95.8	95.8	94.0	90.2	93.6	90.5	89.5
Meat (3/83=100) .....	01	101.2	108.9	108.7	105.6	104.4	103.9	104.7	106.1	112.2	111.5	114.7
Fish (3/83=100) .....	03	100.4	99.8	98.7	98.0	98.7	101.0	103.6	102.6	101.8	102.2	106.2
Grain and grain preparations (3/80=100) .....	04	105.6	102.7	107.4	101.2	92.9	92.4	90.3	82.6	87.1	82.1	79.1
Vegetables and fruit (3/83=100) .....	05	116.1	116.2	126.8	125.5	114.6	119.4	120.1	126.8	118.8	115.2	125.7
Feedstuffs for animals (3/83=100) .....	08	117.4	106.9	98.8	83.5	82.4	72.8	68.6	75.7	83.4	88.5	85.5
Misc. food products (3/83=100) .....	09	101.7	104.9	110.6	109.5	108.4	110.6	109.2	108.1	107.7	106.0	104.7
<b>Beverages and tobacco (6/83=100)</b> .....	1	101.5	101.6	101.9	102.8	101.3	99.9	100.1	99.7	98.6	95.6	96.5
Beverages (9/83=100) .....	11	103.3	102.3	102.9	103.3	103.7	104.0	105.3	101.8	100.9	101.9	103.0
Tobacco and tobacco products (6/83=100) .....	12	101.4	101.6	101.8	102.7	101.1	99.5	99.6	99.5	98.4	95.1	95.9
<b>Crude materials (6/83=100)</b> .....	2	112.2	112.5	118.3	105.2	101.4	97.5	96.8	93.3	92.5	95.8	95.6
Raw hides and skins (6/80=100) .....	21	135.2	145.6	154.7	153.7	133.6	121.0	126.2	129.0	139.9	138.9	148.9
Oilseeds and oleaginous fruit (9/77=100) .....	22	96.8	93.9	104.3	79.9	74.8	71.0	71.2	64.2	63.9	66.9	65.8
Crude rubber (including synthetic and reclaimed) (9/83=100) .....	23	102.2	103.3	106.0	104.1	104.0	106.4	106.3	107.1	106.0	106.0	106.1
Wood .....	24	129.8	131.1	129.4	123.8	125.4	128.7	125.7	124.5	128.1	128.7	128.7
Pulp and waste paper (6/83=100) .....	25	106.0	112.5	122.1	120.8	114.2	100.5	96.1	93.8	92.7	98.8	109.7
Textile fibers .....	26	123.1	120.5	125.6	109.4	106.7	102.4	105.8	103.6	97.7	101.6	98.6
Crude fertilizers and minerals .....	27	144.8	146.6	147.7	163.0	163.2	165.6	167.9	169.4	165.5	168.0	166.1
Metalliferous ores and metal scrap .....	28	96.7	100.2	98.5	93.2	92.4	89.2	82.0	80.1	78.7	83.4	80.5
<b>Mineral fuels</b> .....	3	99.2	99.1	99.7	99.7	99.7	100.1	99.2	97.6	96.6	91.9	86.2
<b>Animal and vegetable oils, fats, and waxes</b> .....	4	122.0	129.8	164.5	145.7	147.9	142.0	144.5	114.5	101.4	90.8	84.4
Fixed vegetable oils and fats (6/83=100) .....	42	129.3	133.2	176.4	159.0	156.7	152.9	164.8	128.8	108.7	95.4	95.3
<b>Chemicals (3/83=100)</b> .....	5	98.6	101.4	99.7	98.3	97.7	97.0	96.8	97.1	96.6	96.5	95.4
Organic chemicals (12/83=100) .....	51	100.0	100.2	101.0	97.4	94.7	93.8	96.5	97.1	95.4	93.5	89.3
Fertilizers, manufactured (3/83=100) .....	56	96.8	108.3	96.9	97.4	94.8	92.5	87.9	89.8	90.0	88.6	84.0
<b>Intermediate manufactured products (9/81=100)</b> .....	-	100.0	101.0	101.3	102.0	100.4	99.4	99.2	99.2	99.1	100.3	101.2
Leather and furskins (9/79=100) .....	6	75.8	83.5	81.2	80.8	79.0	82.5	79.2	75.9	78.5	77.8	82.5
Rubber manufactures .....	61	145.0	146.7	147.5	148.9	148.5	150.2	149.0	148.3	148.7	151.0	150.0
Paper and paperboard products (6/78=100) .....	62	145.5	150.2	154.7	160.0	159.5	155.0	151.6	149.6	148.2	152.2	158.7
Iron and steel (3/82=100) .....	64	96.3	95.9	96.1	96.8	96.5	95.5	95.3	95.9	98.2	98.4	99.4
Nonferrous metals (9/81=100) .....	-	93.8	94.2	92.9	90.4	82.5	79.7	79.6	79.8	78.2	80.2	79.1
Metal manufactures, n.e.s. (3/82=100) .....	-	102.1	103.1	104.5	105.1	105.0	105.4	105.2	105.4	104.4	105.3	105.5
<b>Machinery and transport equipment, excluding military and commercial aircraft (12/78=100)</b> .....	67	137.0	138.5	139.4	140.1	141.5	142.3	142.9	143.1	143.3	144.0	144.1
Power generating machinery and equipment (12/78=100) .....	68	154.4	158.4	156.9	160.6	167.5	165.3	167.4	167.1	167.5	169.1	169.2
Machinery specialized for particular industries (9/78=100) .....	69	151.1	152.3	152.8	153.7	153.4	155.0	155.7	156.0	156.2	155.5	154.7
Metalworking machinery (6/78=100) .....	7	148.7	150.8	151.2	151.7	151.9	153.4	155.1	156.3	158.4	159.0	158.9
General industrial machines and parts n.e.s. 9/78=100) .....	71	145.9	148.6	149.0	149.3	150.2	152.4	152.0	152.4	152.2	152.3	153.3
Office machines and automatic data processing equipment .....	72	102.5	101.4	101.5	99.8	101.4	100.9	100.0	99.9	99.4	99.9	99.2
Telecommunications, sound recording and reproducing equipment .....	73	132.1	133.0	132.3	134.4	134.3	133.3	133.3	134.1	134.5	136.5	137.0
Electrical machinery and equipment .....	74	109.8	110.2	112.6	113.8	114.6	114.9	116.1	115.3	113.8	115.1	114.1
Road vehicles and parts (3/80=100) .....	75	128.8	130.2	131.2	131.0	131.8	133.1	133.9	133.8	135.0	135.5	136.4
Other transport equipment, excl. military and commercial aviation .....	76	179.3	183.1	187.7	189.6	191.7	195.5	196.6	199.3	200.7	203.3	205.6
<b>Other manufactured articles</b> .....	77	100.2	100.6	100.4	100.7	99.3	99.5	100.4	100.3	100.3	102.6	103.4
Apparel (9/83=100) .....	78	100.8	101.9	102.1	103.9	103.4	104.7	104.7	105.0	105.3	-	-
Professional, scientific, and controlling instruments and apparatus .....	79	171.5	171.8	172.0	175.8	171.7	175.5	178.3	178.7	178.8	182.2	183.8
Photographic apparatus and supplies, optical goods, watches and clocks (12/77=100) .....	8	132.0	132.0	131.3	132.7	130.3	128.0	129.1	127.5	128.5	131.6	132.9
Miscellaneous manufactured articles, n.e.s. .....	84	98.2	98.5	97.9	95.2	94.1	92.4	93.1	93.1	92.4	95.6	95.6
<b>Gold, non-monetary (6/83=100)</b> .....	971	96.2	95.8	93.5	81.7	79.5	69.1	75.4	77.4	77.5	81.8	82.2

- Data not available.



### 37. U.S. import price indexes by Standard International Trade Classification

(June 1977=100, unless otherwise indicated)

Category	1974 SITC	1984			1985			1986		
		June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
<b>ALL COMMODITIES (9/82=100)</b> .....		98.3	96.7	95.7	93.5	93.0	92.9	94.2	88.5	83.2
<b>Food (9/77=100)</b> .....	0	103.5	102.0	98.1	98.5	96.8	94.9	102.8	113.4	104.7
Meat .....	01	133.8	135.4	132.3	130.4	118.2	120.6	131.2	122.7	118.5
Dairy products and eggs (6/81=100) .....	02	99.8	98.9	98.4	98.3	97.9	99.1	100.5	106.7	107.1
Fish .....	03	134.2	134.2	133.9	132.9	129.4	129.7	132.7	139.3	144.8
Bakery goods, pasta products, grain and grain preparations (9/77=100) .....	04	134.8	132.9	132.8	131.8	132.3	136.3	141.9	146.9	149.3
Fruits and vegetables .....	05	135.8	135.4	117.2	127.1	129.4	120.2	131.3	119.4	119.4
Sugar, sugar preparations, and honey (3/82=100) .....	06	120.3	119.0	118.5	118.4	122.6	123.1	111.9	124.6	121.6
Coffee, tea, cocoa .....	07	62.4	60.3	58.4	57.0	56.0	54.4	64.6	85.9	69.2
<b>Beverages and tobacco</b> .....	1	156.3	157.1	156.5	156.2	157.1	158.0	162.1	163.2	165.5
Beverages .....	11	153.6	153.5	152.8	154.2	154.3	156.0	159.1	161.8	163.9
<b>Crude materials</b> .....	2	102.6	100.6	98.9	94.0	93.6	91.5	91.2	94.2	95.3
Crude rubber (inc. synthetic & reclaimed) (3/84=100) .....	23	93.7	90.7	83.8	77.6	76.4	68.9	73.2	78.8	75.5
Wood (9/81=100) .....	24	103.2	99.6	104.0	100.7	106.9	101.6	99.4	104.3	106.3
Pulp and waste paper (12/81=100) .....	25	96.1	96.3	93.2	84.0	80.4	76.8	75.8	74.9	79.9
Crude fertilizers and crude minerals (12/83=100) .....	27	96.2	98.0	98.6	100.3	101.7	102.7	102.1	101.5	100.0
Metalliferous ores and metal scrap (3/84=100) .....	28	102.8	100.1	95.6	90.4	87.6	89.5	90.1	94.5	95.6
Crude vegetable and animal materials, n.e.s. ....	29	100.8	101.1	106.4	104.3	104.9	102.5	102.5	103.6	104.4
<b>Fuels and related products (6/82=100)</b> .....	3	88.0	86.9	85.2	82.9	80.9	79.8	79.1	55.3	37.4
Petroleum and petroleum products (6/82=100) .....	33	88.1	87.0	85.2	83.8	81.6	80.3	80.1	54.7	36.1
<b>Fats and oils (9/83=100)</b> .....	4	141.8	124.4	114.9	89.9	76.7	57.6	50.6	41.4	39.3
Vegetable oils (9/83=100) .....	42	143.1	125.3	115.3	89.5	75.9	56.2	48.9	39.3	37.4
<b>Chemicals (9/82=100)</b> .....	5	100.6	98.8	97.1	95.7	94.9	94.5	94.2	94.6	93.3
Medicinal and pharmaceutical products (3/84=100) .....	54	98.5	96.4	94.6	91.6	95.1	95.3	96.7	102.9	104.9
Manufactured fertilizers (3/84=100) .....	56	101.7	98.5	92.9	94.2	82.0	80.8	78.5	79.2	79.7
Chemical materials and products, n.e.s. (9/84=100) .....	59	-	100.0	97.5	96.1	95.6	96.9	97.8	99.9	100.2
<b>Intermediate manufactured products (12/77=100)</b> .....	6	139.6	137.2	136.8	133.1	132.4	133.6	133.4	134.0	135.6
Leather and furskins .....	61	145.3	144.0	140.4	135.3	133.3	137.0	141.3	141.6	143.0
Rubber manufactures, n.e.s. ....	62	140.8	139.6	140.5	139.5	138.6	137.3	138.1	136.5	137.7
Cork and wood manufactures .....	63	131.0	126.4	126.1	121.3	121.2	123.4	124.0	130.8	134.3
Paper and paperboard products .....	64	150.4	156.1	157.5	157.6	157.2	157.8	156.5	157.1	157.1
Textiles .....	65	130.1	131.6	132.9	130.4	127.5	126.5	128.1	131.2	132.9
Nonmetallic mineral manufactures, n.e.s. ....	66	166.6	156.6	159.4	154.3	151.8	157.6	162.3	164.2	169.6
Iron and steel (9/78=100) .....	67	123.8	124.7	123.7	121.0	120.1	119.1	118.3	117.3	118.1
Nonferrous metals (12/81=100) .....	68	96.3	90.2	87.3	81.9	82.3	83.7	80.4	79.4	78.9
Metal manufactures, n.e.s. ....	69	120.5	119.3	119.3	117.4	117.8	119.5	121.6	124.4	127.8
<b>Machinery and transport equipment (6/81=100)</b> .....	7	104.1	102.6	102.9	101.6	102.6	103.5	107.2	111.5	115.3
Machinery specialized for particular industries (9/78=100) .....	72	100.0	98.8	98.0	96.2	97.0	101.4	104.9	112.1	115.4
Metalworking machinery (3/80=100) .....	73	93.8	92.1	89.9	86.3	90.5	94.2	98.1	105.0	107.7
General industrial machinery and parts, n.e.s. (6/81=100) .....	74	94.4	92.4	91.3	89.2	91.1	94.3	98.0	103.8	109.0
Office machines and automatic data processing equipment (3/80=100) .....	75	96.7	94.1	92.2	89.6	89.4	90.3	93.7	96.9	100.8
Telecommunications, sound recording and reproducing apparatus (3/80=100) .....	76	94.8	93.6	91.3	90.0	88.8	88.3	88.6	89.4	91.6
Electrical machinery and equipment (12/81=100) .....	77	91.2	87.0	86.4	82.1	83.9	81.4	83.1	84.5	87.4
Road vehicles and parts (6/81=100) .....	78	110.4	109.8	111.3	111.5	112.1	112.7	117.8	123.4	127.1
<b>Misc. manufactured articles (3/80=100)</b> .....	8	101.5	99.7	100.0	97.0	98.0	99.6	100.8	103.3	104.8
Plumbing, heating, and lighting fixtures (6/80=100) .....	81	112.0	110.7	111.6	113.9	114.1	117.8	115.0	120.1	123.5
Furniture and parts (6/80=100) .....	82	140.8	138.4	142.5	137.4	136.7	142.1	142.7	147.0	142.2
Clothing (9/77=100) .....	84	132.5	135.4	138.5	136.7	133.9	134.5	134.5	133.4	135.3
Footwear .....	85	140.8	138.4	142.5	137.4	136.7	142.1	142.7	147.0	142.2
Professional, scientific, and controlling instruments and apparatus (12/79=100) .....	87	97.8	95.6	92.9	89.2	92.3	98.8	102.4	106.4	112.5
Photographic apparatus and supplies, optical goods, watches, and clocks (3/80=100) .....	88	92.8	91.2	91.3	88.9	89.5	91.1	94.5	99.3	103.7
Misc. manufactured articles, n.e.s. (6/82=100) .....	89	104.0	98.3	96.3	91.2	95.2	96.4	97.9	102.1	103.4
<b>Gold, non-monetary (6/82=100)</b> .....	971	-	-	-	-	-	-	-	-	-

- Data not available.

**38. U.S. export price indexes by end-use category**

(September 1983 = 100 unless otherwise indicated)

Category	Per-centage of 1980 trade value	1984			1985				1986	
		June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
Foods, feeds, and beverages .....	16.294	98.5	88.8	83.0	81.5	80.9	76.2	77.5	75.5	74.7
Raw materials .....	30.696	102.5	100.5	99.1	97.6	97.2	96.5	95.9	96.0	94.8
Raw materials, nondurable .....	21.327	104.4	102.8	101.4	99.6	99.5	98.7	97.9	97.5	96.0
Raw materials, durable .....	9.368	97.7	95.0	93.3	92.6	91.6	91.1	91.0	92.5	91.9
Capital goods (12/82 = 100) .....	30.186	103.9	104.6	105.6	106.2	106.6	106.6	106.6	107.4	107.5
Automotive vehicles, parts and engines (12/82 = 100) .....	7.483	105.3	105.3	105.7	106.7	108.0	108.1	109.2	109.5	110.4
Consumer goods .....	7.467	100.9	101.3	100.8	100.9	101.1	101.9	101.4	103.7	104.5
Durables .....	3.965	99.6	99.4	99.3	99.1	99.2	100.4	99.5	101.8	101.8
Nondurables .....	3.501	102.1	103.0	102.3	102.7	103.0	103.3	103.3	105.5	107.2

**39. U.S. import price indexes by end-use category**

(December 1982 = 100)

Category	Per-centage of 1980 trade value	1984			1985				1986	
		June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
Foods, feeds, and beverages .....	7.477	107.2	105.6	101.8	102.1	100.4	99.0	106.0	115.8	108.2
Petroleum and petroleum products, excl. natural gas .....	31.108	88.5	87.5	85.7	84.4	82.1	80.9	80.5	55.4	36.7
Raw materials, excluding petroleum .....	19.205	104.3	102.5	101.1	96.3	95.8	95.4	93.9	94.5	94.0
Raw materials, nondurable .....	9.391	102.1	101.7	100.7	95.0	93.9	93.5	91.8	91.1	89.7
Raw materials, durable .....	9.814	106.7	103.3	101.6	97.7	97.8	97.4	96.2	98.1	98.7
Capital goods .....	13.164	99.8	98.0	97.8	94.8	96.3	97.6	100.0	102.8	106.6
Automotive vehicles, parts and engines .....	11.750	104.9	104.0	105.2	105.4	105.9	106.4	111.4	115.6	119.0
Consumer goods .....	14.250	101.9	100.6	101.1	99.5	99.4	101.0	102.4	104.5	106.6
Durable .....	5.507	101.4	98.8	98.5	97.0	97.0	98.9	100.7	103.4	106.6
Nondurable .....	8.743	102.5	103.0	104.6	103.0	102.5	103.9	104.7	106.0	106.6

**40. U.S. export price indexes by Standard Industrial Classification <sup>1</sup>**

Industry group	1984			1985				1986	
	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
Manufacturing:									
Food and kindred products (6/83 = 100) .....	112.7	105.6	103.3	99.5	99.5	96.7	98.1	97.0	95.0
Lumber and wood products, except furniture (6/83 = 100) .....	100.1	97.0	97.9	99.9	99.5	98.3	101.2	101.5	101.2
Furniture and fixtures (9/83 = 100) .....	103.1	103.5	104.9	105.2	106.5	107.1	108.4	109.2	109.7
Paper and allied products (3/81 = 100) .....	104.3	106.2	103.6	97.1	94.7	93.2	92.1	95.7	101.6
Chemicals and allied products (12/84 = 100) .....	102.3	101.3	100.7	100.3	99.6	99.7	99.2	98.9	98.3
Petroleum and coal products (12/83 = 100) .....	102.1	100.7	100.4	101.3	102.7	102.0	99.1	93.5	83.1
Primary metal products (3/82 = 100) .....	104.0	100.0	95.8	91.2	92.7	93.6	93.6	96.4	96.6
Machinery, except electrical (9/78 = 100) .....	137.9	138.0	139.9	140.4	140.5	140.6	140.5	140.6	140.3
Electrical machinery (12/80 = 100) .....	109.5	110.7	111.1	111.3	112.4	111.9	111.2	112.6	112.2
Transportation equipment (12/78 = 100) .....	157.2	157.8	158.9	160.5	161.9	162.8	164.3	165.2	166.9
Scientific instruments; optical goods; clocks (6/77 = 100) .....	153.2	156.0	153.0	154.9	156.6	156.2	156.7	159.7	161.2

<sup>1</sup> SIC - based classification.

#### 41. U.S. import price indexes by Standard Industrial Classification <sup>1</sup>

Industry group	1984			1985				1986	
	June	Sept.	Dec.	Mar.	June	Sept.	Dec.	Mar.	June
<b>Manufacturing:</b>									
Food and kindred products (6/77=100) .....	126.6	124.1	122.6	118.8	115.0	114.2	115.1	117.7	115.6
Textile mill products (9/82=100) .....	103.8	104.3	104.7	102.8	101.0	100.4	101.8	104.7	106.4
Apparel and related products (6/77=100) .....	129.6	133.9	138.2	135.6	133.0	133.9	134.4	133.4	135.1
Lumber and wood products, except furniture (6/77=100) .....	121.1	117.3	120.0	116.3	120.6	117.5	115.8	122.1	124.8
Furniture and fixtures (6/80=100) .....	96.9	96.2	95.6	93.9	96.1	97.7	98.2	101.2	103.5
Paper and allied products (6/77=100) .....	141.9	146.0	145.5	141.5	139.8	138.7	137.4	137.6	139.4
Chemicals and allied products (9/82=100) .....	101.8	99.8	98.2	95.3	93.9	93.3	95.8	98.6	102.1
Rubber and miscellaneous plastic products (12/80=100) .....	98.5	97.8	98.0	96.9	96.7	96.6	97.5	100.9	100.6
Leather and leather products .....	143.7	141.6	144.2	139.1	138.9	142.3	144.0	145.8	144.6
Primary metal products (6/81=100) .....	91.9	88.3	86.6	82.2	83.0	83.4	81.9	82.0	82.4
Fabricated metal products (12/84=100) .....	-	-	100.0	99.0	99.1	101.0	102.6	104.9	108.5
Machinery, except electrical (3/80=100) .....	97.1	95.5	94.1	91.8	93.4	96.6	100.0	105.5	108.9
Electrical machinery (9/84=100) .....	-	100.0	98.6	95.1	95.8	94.5	95.8	97.0	100.2
Transportation equipment (6/81=100) .....	111.6	110.7	112.9	113.1	114.2	114.8	119.6	123.9	128.0
Scientific instruments; optical goods; clocks (12/79=100) .....	95.5	94.4	93.2	90.7	91.7	94.6	98.8	103.9	109.5
Miscellaneous manufactured commodities (9/82=100) .....	99.1	95.8	96.4	95.1	95.1	96.6	98.7	99.9	101.7

<sup>1</sup> SIC - based classification.

- Data not available.

#### 42. Indexes of productivity, hourly compensation, and unit costs, quarterly data seasonally adjusted

(1977=100)

Item	Annual average	Quarterly Indexes										
		1984	1984				1985				1986	
			IV	I	II	III	IV	I	II	III	IV	I
<b>Business:</b>												
Output per hour of all persons .....	105.3	103.8	104.9	105.6	105.5	105.5	105.7	106.4	107.3	106.4	107.3	107.2
Compensation per hour .....	168.1	163.6	165.9	167.1	169.0	170.6	172.3	174.5	176.4	178.0	179.1	180.4
Real compensation per hour .....	98.1	98.0	98.1	97.9	98.1	98.2	98.4	98.7	99.1	99.0	99.2	100.3
Unit labor costs .....	159.7	157.7	158.2	158.3	160.2	161.7	163.1	164.0	164.4	167.3	167.0	168.2
Unit nonlabor payments .....	156.3	150.6	154.1	156.7	157.0	157.7	158.3	160.0	161.4	159.6	162.2	161.9
Implicit price deflator .....	158.5	155.2	156.7	157.7	159.0	160.3	161.4	162.6	163.4	164.6	165.3	166.0
<b>Nonfarm business:</b>												
Output per hour of all persons .....	104.3	103.3	103.9	104.6	104.4	104.3	104.4	104.9	105.4	104.5	105.6	105.5
Compensation per hour .....	167.9	163.4	165.6	166.9	168.7	170.4	172.1	174.0	175.4	177.0	178.3	179.3
Real compensation per hour .....	98.0	97.9	97.9	97.8	98.0	98.1	98.2	98.4	98.5	98.4	98.8	99.7
Unit labor costs .....	161.0	158.2	159.4	159.5	161.5	163.3	164.8	165.9	166.3	169.3	168.8	170.0
Unit nonlabor payments .....	156.1	152.3	153.2	156.4	157.2	157.9	158.9	160.8	163.0	160.3	163.9	163.5
Implicit price deflator .....	159.3	156.2	157.2	158.4	160.0	161.4	162.7	164.1	165.2	166.2	167.1	167.7
<b>Nonfinancial corporations:</b>												
Output per hour of all employees .....	105.6	104.5	105.3	105.9	105.5	105.8	106.0	106.5	107.8	107.0	106.9	106.3
Compensation per hour .....	165.9	161.7	163.6	164.8	166.6	168.3	169.9	171.6	173.1	174.5	175.4	176.0
Real compensation per hour .....	96.8	96.8	96.8	96.6	96.7	96.8	97.0	97.0	97.2	97.0	97.1	97.9
Total unit costs .....	161.5	159.0	159.4	160.1	162.6	163.8	164.9	165.8	165.0	167.2	168.3	169.4
Unit labor costs .....	157.0	154.8	155.4	155.7	157.9	159.1	160.3	161.1	160.5	163.0	164.0	165.6
Unit nonlabor costs .....	174.6	171.4	171.1	173.1	176.4	177.5	178.5	179.8	178.3	179.8	181.1	180.9
Unit profits .....	133.4	128.6	134.4	138.5	130.3	130.5	129.3	130.2	141.7	131.2	131.7	128.4
Unit nonlabor payments .....	160.1	156.4	158.3	161.0	160.3	161.0	161.3	162.5	165.5	162.8	163.8	162.5
Implicit price deflator .....	158.1	155.3	156.4	157.5	158.7	159.8	160.6	161.6	162.2	162.9	164.0	164.5
<b>Manufacturing:</b>												
Output per hour of all persons .....	116.6	113.3	114.7	115.7	117.8	118.2	119.3	121.7	123.0	122.9	123.4	124.0
Compensation per hour .....	168.2	163.6	165.4	166.8	169.1	171.5	173.8	175.6	178.1	179.3	180.2	181.4
Real compensation per hour .....	98.1	97.9	97.8	97.8	98.2	98.7	99.2	99.3	100.0	99.7	99.8	100.9
Unit labor costs .....	144.2	144.3	144.1	144.2	143.5	145.1	145.7	144.3	144.8	145.8	146.1	146.2

**43. Annual indexes of multifactor productivity and related measures, selected years**

(1977 = 100)

Item	1960	1970	1973	1974	1976	1978	1979	1980	1981	1982	1983	1984
<b>Private business</b>												
Productivity:												
Output per hour of all persons .....	64.8	86.1	94.8	92.5	97.6	100.5	99.3	98.7	100.6	100.8	103.7	107.1
Output per unit of capital services .....	98.4	98.5	103.0	96.5	96.1	101.8	100.3	95.6	94.1	89.5	92.3	97.4
Multifactor productivity .....	75.4	90.2	97.5	93.8	97.1	101.0	99.7	97.6	98.3	96.8	99.6	103.7
Output .....	53.3	78.3	91.8	89.9	93.7	105.5	107.9	106.4	109.2	106.3	111.1	121.0
Inputs:												
Hours of all persons .....	82.2	90.8	96.8	97.2	95.9	105.0	108.6	107.8	108.5	105.4	107.2	113.0
Capital services .....	54.1	79.4	89.1	93.1	97.5	103.6	107.5	111.4	116.0	118.8	120.4	124.3
Combined units of labor and capital input .....	70.7	86.7	94.1	95.8	96.5	104.5	108.2	109.0	111.0	109.9	111.6	116.8
Capital per hour of all persons .....	65.9	87.4	92.0	95.9	101.6	98.7	98.9	103.3	106.9	112.7	112.3	109.9
<b>Private nonfarm business</b>												
Productivity:												
Output per hour of all persons .....	68.0	86.8	95.3	92.9	97.8	100.6	99.0	98.2	99.6	99.9	103.5	106.3
Output per unit of capital services .....	98.4	98.6	103.2	96.5	96.1	101.9	100.1	95.2	93.2	88.7	91.9	96.6
Multifactor productivity .....	77.6	90.7	97.9	94.1	97.2	101.0	99.4	97.2	97.4	95.9	99.4	102.9
Output .....	52.3	77.8	91.7	89.7	93.6	105.7	108.0	106.4	108.7	105.9	111.3	121.0
Inputs:												
Hours of all persons .....	77.0	89.7	96.2	96.5	95.7	105.1	109.1	108.4	109.1	106.0	107.6	113.8
Capital services .....	53.2	78.9	88.8	93.0	97.4	103.7	107.9	111.7	116.6	119.4	121.1	125.2
Combined units of labor and capital input .....	67.4	85.9	93.6	95.3	96.3	104.6	108.7	109.5	111.6	110.4	112.0	117.5
Capital per hour of all persons .....	69.1	88.0	92.4	96.3	101.8	98.7	98.9	103.1	106.8	112.6	112.6	110.1
<b>Manufacturing</b>												
Productivity:												
Output per hour of all persons .....	60.0	79.2	93.0	90.8	97.6	100.9	101.6	101.7	104.9	107.1	111.6	115.6
Output per unit of capital services .....	87.9	91.8	108.2	99.6	96.1	101.5	99.5	90.7	89.9	82.9	87.6	96.0
Multifactor productivity .....	67.0	82.3	96.8	93.1	97.1	101.1	101.0	98.8	100.8	100.3	104.9	110.4
Output .....	50.7	77.0	95.9	91.9	93.6	105.3	108.2	103.5	106.1	99.3	104.4	115.3
Inputs:												
Hours of all persons .....	84.4	97.3	103.1	101.2	95.9	104.4	106.5	101.7	101.1	92.7	93.5	99.8
Capital services .....	57.6	83.9	88.6	92.2	97.4	103.8	108.8	114.1	118.0	119.8	119.2	120.2
Combined units of labor and capital inputs .....	75.6	93.5	99.0	98.7	96.3	104.2	107.1	104.8	105.2	99.0	99.5	104.5
Capital per hour of all persons .....	68.3	86.2	85.9	91.1	101.6	99.4	102.1	112.2	116.7	129.2	127.5	120.4

**44. Annual indexes of productivity, hourly compensation, unit costs, and prices, selected years**

(1977 = 100)

Item	1960	1970	1973	1974	1976	1978	1979	1980	1981	1982	1983	1984	1985
<b>Business:</b>													
Output per hour of all persons .....	67.6	88.4	95.9	93.9	98.3	100.8	99.6	99.3	100.7	100.3	103.0	105.3	106.4
Compensation per hour .....	33.6	57.8	70.9	77.6	92.8	108.5	119.1	131.5	143.7	154.9	161.5	168.1	175.3
Real compensation per hour .....	68.9	90.2	96.7	95.4	98.7	100.8	99.4	96.7	95.7	97.3	98.2	98.1	98.8
Unit labor costs .....	49.7	65.4	73.9	82.7	94.3	107.6	119.5	132.5	142.7	154.5	156.8	159.7	164.8
Unit nonlabor payments .....	46.4	59.4	72.5	76.4	93.3	106.7	112.5	118.7	134.6	136.6	146.3	156.3	159.7
Implicit price deflator .....	48.5	63.2	73.4	80.5	94.0	107.3	117.0	127.6	139.8	148.1	153.0	158.5	163.0
<b>Nonfarm business:</b>													
Output per hour of all persons .....	71.0	89.3	96.4	94.3	98.5	100.8	99.3	98.8	99.8	99.2	102.4	104.3	104.8
Compensation per hour .....	35.3	58.2	71.2	78.0	92.8	108.6	118.9	131.3	143.6	154.8	161.5	167.9	174.6
Real compensation per hour .....	72.3	90.8	97.1	95.9	98.8	100.9	99.2	96.6	95.7	97.2	98.2	98.0	98.4
Unit labor costs .....	49.7	65.2	73.9	82.7	94.3	107.7	119.7	132.9	144.0	156.0	157.7	161.0	166.7
Unit nonlabor payments .....	46.3	60.0	69.3	74.0	93.0	105.6	110.5	118.5	133.5	136.5	148.1	156.1	160.6
Implicit price deflator .....	48.5	63.4	72.3	79.7	93.8	107.0	116.5	127.8	140.3	149.2	154.3	159.3	164.6
<b>Nonfinancial corporations:</b>													
Output per hour of all employees .....	73.4	91.1	97.5	94.6	98.4	100.6	99.8	99.1	99.6	100.4	103.5	105.6	106.8
Compensation per hour .....	36.9	59.2	71.6	78.2	92.9	108.4	118.7	131.1	143.3	154.3	159.9	165.9	172.3
Real compensation per hour .....	75.5	92.4	97.6	96.1	98.9	100.7	99.1	96.4	95.5	96.9	97.3	96.8	97.0
Unit labor costs .....	50.2	65.0	73.4	82.6	94.3	107.8	119.0	132.3	143.8	153.8	154.5	157.0	161.2
Unit nonlabor payments .....	51.5	60.1	68.9	73.1	93.8	104.4	108.4	118.6	137.8	142.1	152.1	160.1	163.0
Implicit price deflator .....	50.7	63.3	71.9	79.4	94.2	106.6	115.4	127.6	141.7	149.8	153.7	158.1	161.8
<b>Manufacturing:</b>													
Output per hour of all persons .....	62.2	80.8	93.4	90.6	97.1	101.5	101.4	101.4	103.6	105.9	112.0	116.6	121.7
Compensation per hour .....	36.5	57.4	68.8	76.2	92.1	108.2	118.6	132.4	145.2	157.5	162.4	168.2	176.7
Real compensation per hour .....	74.8	89.5	93.8	93.6	98.1	100.5	99.1	97.4	96.7	98.9	98.8	98.1	99.5
Unit labor costs .....	58.7	71.0	73.7	84.1	94.9	106.6	117.0	130.6	140.1	148.7	145.0	144.2	145.1
Unit nonlabor payments .....	60.0	64.1	70.7	67.7	93.5	101.9	98.9	97.8	111.8	114.0	128.5	136.9	134.4
Implicit price deflator .....	59.1	69.0	72.8	79.3	94.5	105.2	111.7	121.0	131.8	138.6	140.2	142.1	142.0

**45. Unemployment rates in nine countries, quarterly data seasonally adjusted**

Country	Annual average		1984	1985				1986	
	1984	1985	IV	I	II	III	IV	I	II
<b>Total labor force basis</b>									
United States .....	7.4	7.1	7.1	7.2	7.2	7.1	6.9	7.0	7.1
Canada .....	11.2	10.4	11.1	11.0	10.5	10.2	10.1	9.7	9.5
Australia .....	8.9	8.2	8.6	8.5	8.4	8.1	7.8	7.9	-
Japan .....	2.7	2.6	2.7	2.6	2.5	2.6	2.9	2.6	2.8
France .....	9.7	10.1	10.0	10.2	10.1	10.2	9.9	10.0	10.3
Germany .....	7.6	7.7	7.7	7.7	7.8	7.7	7.7	7.6	7.5
Great Britain .....	12.8	13.0	12.8	12.9	13.0	13.2	12.8	13.0	13.1
Italy <sup>1, 2</sup> .....	5.8	5.9	5.7	5.8	5.7	5.9	6.2	6.2	6.3
Sweden .....	3.1	2.8	3.0	3.0	2.9	2.7	2.7	2.8	2.6
<b>Civilian labor force basis</b>									
United States .....	7.5	7.2	7.2	7.3	7.3	7.2	7.0	7.1	7.2
Canada .....	11.3	10.5	11.1	11.1	10.6	10.2	10.1	9.7	9.6
Australia .....	9.0	8.3	8.6	8.6	8.5	8.2	7.9	8.0	-
Japan .....	2.8	2.6	2.7	2.6	2.6	2.7	2.9	2.7	2.8
France .....	9.9	10.4	10.3	10.5	10.4	10.4	10.1	10.3	10.5
Germany .....	7.8	7.9	7.8	7.9	7.9	7.9	7.8	7.8	7.6
Great Britain .....	12.9	13.1	13.0	13.1	13.2	13.4	13.0	13.1	13.3
Italy .....	5.9	6.0	5.8	5.9	5.8	6.0	6.3	6.3	6.5
Sweden .....	3.1	2.8	3.0	3.0	2.9	2.8	2.7	2.8	2.6

<sup>1</sup> Quarterly rates are for the first month of the quarter.

<sup>2</sup> Major changes in the Italian labor force survey, introduced in 1977, resulted in a large increase in persons enumerated as unemployed. However, many persons reported that they had not actively sought work in the past 30 days, and they have been provisionally excluded for comparability with U.S. concepts. Inclusion of such persons would more than double the Italian unemployment rate

shown.

- Data not available.

NOTE: Quarterly figures for France, Germany, and Great Britain are calculated by applying annual adjustment factors to current published data and therefore should be viewed as less precise indicators of unemployment under U.S. concepts than the annual figures.

## 46. Annual data: Employment status of the civilian working-age population, ten countries

(Numbers in thousands)

Employment status and country	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985
<b>Labor force</b>										
United States .....	96,158	99,009	102,251	104,962	106,940	108,670	110,204	111,550	113,544	115,461
Canada .....	10,203	10,500	10,895	11,231	11,573	11,904	11,958	12,183	12,399	12,639
Australia .....	6,244	6,358	6,443	6,519	6,693	6,810	6,910	6,997	7,133	7,272
Japan .....	53,100	53,820	54,610	55,210	55,740	56,320	56,980	58,110	58,480	58,820
France .....	22,000	22,300	22,470	22,670	22,790	22,930	23,150	23,130	23,290	23,330
Germany .....	25,900	25,870	26,000	26,250	26,520	26,650	26,710	26,740	26,880	27,090
Great Britain .....	25,290	25,430	25,620	25,710	25,870	25,870	25,880	26,010	26,530	26,960
Italy .....	20,300	20,530	20,630	20,910	21,210	21,410	21,450	21,610	21,680	21,800
Netherlands .....	4,890	4,950	5,010	5,100	5,290	5,500	5,560	5,720	5,740	5,690
Sweden .....	4,149	4,168	4,203	4,262	4,312	4,326	4,350	4,369	4,385	4,418
<b>Participation rate</b>										
United States .....	61.6	62.3	63.2	63.7	63.8	63.9	64.0	64.0	64.4	64.8
Canada .....	61.1	61.6	62.7	63.4	64.1	64.8	64.1	64.4	64.8	65.2
Australia .....	62.7	62.7	62.0	61.7	62.2	62.0	61.8	61.5	61.5	61.8
Japan .....	62.4	62.5	62.8	62.7	62.6	62.6	62.7	63.1	62.7	62.3
France .....	57.3	57.6	57.5	57.5	57.2	57.1	57.1	56.6	56.6	56.4
Germany .....	53.8	53.4	53.3	53.3	53.2	52.9	52.7	52.5	52.6	53.2
Great Britain .....	63.2	63.2	63.3	63.2	63.2	62.2	61.9	61.9	62.7	63.6
Italy .....	47.8	48.0	47.7	47.8	48.0	48.0	47.4	47.2	47.3	47.2
Netherlands .....	49.1	49.0	48.8	49.0	50.0	51.3	51.2	52.1	52.0	51.2
Sweden .....	66.0	65.9	66.1	66.6	67.0	66.8	66.8	66.7	66.8	67.2
<b>Employed</b>										
United States .....	88,752	92,017	96,048	98,824	99,303	100,397	99,526	100,834	105,005	107,150
Canada .....	9,477	9,651	9,987	10,395	10,708	11,006	10,644	10,734	11,000	11,311
Australia .....	5,946	6,000	6,038	6,111	6,284	6,416	6,415	6,300	6,490	6,670
Japan .....	52,020	52,720	53,370	54,040	54,600	55,060	55,620	56,550	56,870	57,260
France .....	21,010	21,180	21,260	21,300	21,320	21,200	21,230	21,170	20,980	20,910
Germany .....	25,010	24,970	25,130	25,470	25,750	25,560	25,130	24,750	24,790	24,960
Great Britain .....	23,810	23,840	24,040	24,360	24,100	23,190	22,820	22,680	23,100	23,420
Italy .....	19,600	19,800	19,870	20,100	20,380	20,480	20,430	20,470	20,390	20,490
Netherlands .....	4,630	4,700	4,750	4,830	4,960	4,990	4,930	4,890	4,880	4,890
Sweden .....	4,083	4,093	4,109	4,174	4,226	4,218	4,213	4,218	4,249	4,293
<b>Employment-population ratio</b>										
United States .....	56.8	57.9	59.3	59.9	59.2	59.0	57.8	57.9	59.5	60.1
Canada .....	56.7	56.6	57.5	58.7	59.3	59.9	57.0	56.7	57.4	58.4
Australia .....	59.7	59.2	58.1	57.9	58.4	58.4	57.3	55.4	56.0	56.6
Japan .....	61.1	61.2	61.3	61.4	61.3	61.2	61.2	61.4	61.0	60.6
France .....	54.8	54.7	54.4	54.0	53.5	52.8	52.3	51.8	51.0	50.5
Germany .....	52.0	51.6	51.5	51.7	51.7	50.8	49.6	48.6	48.5	49.0
Great Britain .....	59.5	59.3	59.4	59.8	58.9	55.8	54.6	54.0	54.6	55.2
Italy .....	46.1	46.3	45.9	45.9	46.1	45.9	45.2	44.7	44.5	44.4
Netherlands .....	46.5	46.5	46.3	46.4	46.9	46.5	45.4	44.5	44.2	44.0
Sweden .....	64.9	64.8	64.6	65.3	65.6	65.1	64.7	64.4	64.7	65.3
<b>Unemployed</b>										
United States .....	7,406	6,991	6,202	6,137	7,637	8,273	10,678	10,717	8,539	8,312
Canada .....	726	849	908	836	865	898	1,314	1,448	1,399	1,328
Australia .....	298	358	405	408	409	394	495	697	642	602
Japan .....	1,080	1,100	1,240	1,170	1,140	1,260	1,360	1,560	1,610	1,560
France .....	990	1,120	1,210	1,370	1,470	1,730	1,920	1,960	2,310	2,420
Germany .....	890	900	870	780	770	1,090	1,580	1,990	2,090	2,130
Great Britain .....	1,480	1,590	1,580	1,350	1,770	2,680	3,060	3,330	3,430	3,540
Italy .....	700	740	760	810	830	920	1,020	1,140	1,280	1,310
Netherlands .....	260	250	260	270	330	510	630	830	860	800
Sweden .....	66	75	94	88	86	108	137	151	136	125
<b>Unemployment rate</b>										
United States .....	7.7	7.1	6.1	5.8	7.1	7.6	9.7	9.6	7.5	7.2
Canada .....	7.1	8.1	8.3	7.4	7.5	7.5	11.0	11.9	11.3	10.5
Australia .....	4.8	5.6	6.3	6.3	6.1	5.8	7.2	10.0	9.0	8.3
Japan .....	2.0	2.0	2.3	2.1	2.0	2.2	2.4	2.7	2.8	2.6
France .....	4.5	5.0	5.4	6.0	6.4	7.5	8.3	8.5	9.9	10.4
Germany .....	3.4	3.5	3.4	3.0	2.9	4.1	5.9	7.4	7.8	7.9
Great Britain .....	5.9	6.3	6.2	5.3	6.8	10.4	11.8	12.8	12.9	13.1
Italy .....	3.4	3.6	3.7	3.9	3.9	4.3	4.8	5.3	5.9	6.0
Netherlands .....	5.3	5.0	5.2	5.3	6.2	9.3	11.3	14.5	15.0	14.1
Sweden .....	1.6	1.8	2.2	2.1	2.0	2.5	3.1	3.5	3.1	2.8

## 47. Annual indexes of manufacturing productivity and related measures, twelve countries

(1977 = 100)

Item and country	1960	1970	1973	1974	1976	1977	1979	1980	1981	1982	1983	1984	1985
<b>Output per hour</b>													
United States .....	62.2	80.8	93.4	90.6	97.1	100.0	101.4	101.4	103.6	105.9	112.9	118.5	121.8
Canada .....	50.3	76.8	91.3	93.4	96.2	100.0	104.2	101.9	104.0	101.0	107.6	111.5	115.1
Japan .....	23.2	64.8	83.1	86.5	94.3	100.0	114.8	122.7	127.2	135.0	142.3	152.2	159.9
Belgium .....	32.8	60.0	78.7	83.2	95.3	100.0	111.8	119.3	127.2	132.8	141.0	145.5	-
Denmark .....	37.2	65.5	83.2	86.0	98.2	100.0	106.5	112.3	114.2	114.6	117.3	118.3	118.4
France .....	36.4	69.6	82.2	85.2	95.0	100.0	110.3	112.0	116.4	123.5	129.3	135.0	140.2
Germany .....	40.3	71.2	84.0	87.4	96.5	100.0	108.2	108.6	111.0	112.6	119.0	124.7	131.9
Italy .....	36.5	72.7	90.9	95.3	98.9	100.0	110.5	116.9	121.0	123.4	126.6	135.0	139.1
Netherlands .....	32.4	64.3	81.5	88.1	95.8	100.0	112.3	113.9	116.9	119.4	126.1	139.3	-
Norway .....	54.6	81.7	94.6	97.7	99.7	100.0	107.1	109.3	109.7	112.6	119.2	122.3	125.0
Sweden .....	42.3	80.7	94.8	98.8	101.7	100.0	110.9	112.7	113.2	116.5	125.5	132.6	135.2
United Kingdom .....	53.8	77.6	92.9	95.2	99.1	100.0	102.2	101.2	107.9	112.7	121.2	126.2	129.7
<b>Output</b>													
United States .....	52.5	78.6	96.3	91.7	93.1	100.0	108.1	103.2	104.8	98.4	105.6	117.9	121.0
Canada .....	41.5	75.1	94.6	98.0	98.1	100.0	110.9	107.7	108.8	96.4	101.7	110.1	115.2
Japan .....	19.2	69.9	91.9	91.7	94.8	100.0	113.9	124.1	129.8	137.3	148.2	165.2	175.8
Belgium .....	41.7	78.1	95.8	99.6	99.5	100.0	104.2	107.2	105.9	109.1	110.7	112.8	-
Denmark .....	49.2	82.0	95.9	97.4	99.6	100.0	105.4	110.1	106.6	108.3	112.2	118.6	122.3
France .....	35.4	73.3	88.6	91.8	96.1	100.0	106.1	106.6	105.9	106.0	107.4	108.4	109.0
Germany .....	50.0	86.6	96.1	95.4	98.0	100.0	106.6	106.6	104.9	102.4	103.5	107.4	113.0
Italy .....	37.4	78.0	90.5	96.3	97.9	100.0	108.6	115.4	114.3	111.6	109.2	113.2	115.3
Netherlands .....	44.8	84.4	95.8	100.0	99.0	100.0	106.1	106.6	106.7	105.0	105.3	110.8	-
Norway .....	55.1	87.0	99.5	104.0	101.4	100.0	100.3	101.3	100.1	99.8	98.8	101.3	103.7
Sweden .....	52.6	92.5	100.3	105.7	106.1	100.0	103.6	104.0	100.6	100.1	105.2	112.4	114.6
United Kingdom .....	71.0	94.7	104.7	103.5	98.2	100.0	100.5	91.7	86.2	86.4	88.9	92.4	95.0
<b>Total hours</b>													
United States .....	84.4	97.3	103.1	101.2	95.9	100.0	106.5	101.7	101.1	92.9	93.5	99.5	99.3
Canada .....	82.6	97.7	103.6	105.0	102.0	100.0	106.4	105.7	104.6	95.4	94.6	98.7	100.1
Japan .....	82.7	107.9	110.7	106.1	100.6	100.0	99.3	101.2	102.0	101.7	104.2	108.5	110.0
Belgium .....	127.0	130.1	121.8	119.7	104.4	100.0	93.2	89.9	83.3	82.1	78.5	77.5	-
Denmark .....	132.4	125.1	115.2	113.2	101.4	100.0	99.0	98.1	93.4	94.5	95.7	100.2	103.3
France .....	97.2	105.3	107.8	107.8	101.2	100.0	96.2	95.2	91.0	85.9	83.0	80.3	77.8
Germany .....	123.8	121.7	114.4	109.2	101.6	100.0	98.5	98.1	94.6	91.0	87.0	86.2	85.7
Italy .....	102.3	107.4	99.6	101.0	99.0	100.0	98.2	98.7	94.5	90.4	86.2	83.9	82.9
Netherlands .....	138.4	131.2	117.6	113.5	103.3	100.0	94.4	93.6	91.2	88.0	83.5	79.5	-
Norway .....	101.0	106.4	105.1	106.5	101.7	100.0	93.6	92.6	91.3	88.6	82.9	82.8	83.0
Sweden .....	124.4	114.6	105.7	107.0	104.3	100.0	93.4	92.3	88.9	85.9	83.9	84.8	84.8
United Kingdom .....	131.9	122.1	112.7	108.7	99.0	100.0	98.3	90.7	79.9	76.7	73.3	73.2	73.3
<b>Compensation per hour</b>													
United States .....	36.5	57.3	68.8	76.2	92.1	100.0	118.6	132.4	145.2	157.5	163.2	169.1	176.6
Canada .....	27.1	46.5	59.2	68.5	89.9	100.0	118.3	130.6	151.5	167.1	179.3	182.1	191.4
Japan .....	8.9	33.9	55.1	72.3	90.7	100.0	113.4	120.7	129.8	136.6	140.7	144.8	148.3
Belgium .....	13.8	34.9	53.5	65.2	89.5	100.0	117.6	130.4	144.6	162.0	163.7	176.6	-
Denmark .....	12.6	36.3	56.1	67.9	90.4	100.0	123.1	135.9	149.6	162.9	174.3	183.9	195.5
France .....	15.1	36.6	52.3	62.0	88.9	100.0	129.3	147.5	170.3	200.8	226.2	246.5	262.7
Germany .....	18.8	48.0	67.5	76.9	91.3	100.0	116.1	125.6	134.5	141.0	148.4	155.3	164.7
Italy .....	8.3	26.1	43.7	54.5	84.2	100.0	134.7	160.2	197.1	237.3	276.4	303.0	334.0
Netherlands .....	12.5	39.0	60.5	71.9	91.9	100.0	117.0	123.6	129.1	137.5	144.7	152.8	-
Norway .....	15.8	37.9	54.5	63.6	88.8	100.0	116.0	128.0	142.8	156.0	173.5	188.3	205.2
Sweden .....	14.7	38.5	54.2	63.8	91.5	100.0	120.1	133.6	148.1	158.9	173.3	190.7	205.8
United Kingdom .....	14.8	30.8	44.8	56.9	88.4	100.0	137.7	165.8	188.9	206.4	222.4	237.2	257.0
<b>Unit labor costs: National currency basis:</b>													
United States .....	58.7	70.9	73.7	84.1	94.9	100.0	117.0	130.6	140.1	148.7	144.5	142.8	145.0
Canada .....	53.9	60.6	64.8	73.3	93.5	100.0	113.5	128.1	145.7	165.4	166.7	163.2	166.3
Japan .....	38.4	52.3	66.4	83.6	96.2	100.0	98.8	98.4	102.0	101.2	98.9	95.1	92.7
Belgium .....	42.0	58.1	68.0	78.3	93.9	100.0	105.2	109.3	113.6	114.4	116.1	121.4	-
Denmark .....	33.8	55.4	67.4	79.0	92.1	100.0	115.7	121.0	131.1	142.2	148.6	155.5	165.1
France .....	41.6	52.6	63.6	72.8	93.6	100.0	117.3	131.7	146.3	162.6	175.0	182.5	187.4
Germany .....	46.6	67.4	80.3	88.0	94.6	100.0	107.3	115.7	121.2	125.2	124.7	124.6	124.9
Italy .....	22.8	36.0	48.1	57.2	85.1	100.0	121.9	137.0	162.9	192.4	218.3	224.5	240.1
Netherlands .....	38.5	60.7	74.3	81.6	96.0	100.0	104.1	108.5	110.4	115.2	114.7	109.7	-
Norway .....	29.0	46.4	57.6	65.2	89.1	100.0	108.2	117.0	130.2	138.6	145.5	154.0	164.2
Sweden .....	34.8	47.7	57.2	64.6	90.0	100.0	108.3	118.6	130.9	136.3	138.1	143.8	152.2
United Kingdom .....	27.6	39.7	48.2	59.7	89.2	100.0	134.7	163.8	175.1	183.1	183.5	187.9	198.1
<b>Unit labor costs: U.S. dollar basis:</b>													
United States .....	58.7	70.9	73.7	84.1	94.9	100.0	117.0	130.6	140.1	148.7	144.5	142.8	145.0
Canada .....	59.0	61.7	68.8	79.7	100.7	100.0	103.0	116.4	129.1	142.3	143.7	133.9	129.4
Japan .....	28.5	39.1	65.6	76.8	86.9	100.0	121.3	116.8	123.8	108.8	111.5	107.2	104.2
Belgium .....	30.2	42.0	62.8	72.1	87.2	100.0	128.5	134.1	109.9	89.5	81.3	75.3	-
Denmark .....	29.5	44.4	67.2	77.9	91.5	100.0	132.0	129.0	110.3	102.3	97.5	90.1	93.5
France .....	41.7	46.8	70.4	74.5	96.3	100.0	135.5	153.4	132.2	121.5	112.9	102.7	102.6
Germany .....	25.9	42.9	70.4	79.1	87.3	100.0	135.9	147.9	124.9	119.7	113.4	101.6	98.6
Italy .....	32.5	50.6	73.1	77.6	90.5	100.0	129.5	141.4	126.3	125.4	126.8	112.8	111.1
Netherlands .....	25.1	41.2	65.6	74.6	89.1	100.0	127.4	134.2	108.9	105.8	98.6	83.9	-
Norway .....	21.7	34.5	53.4	62.8	86.9	100.0	113.8	126.2	120.6	114.2	106.1	100.4	101.7
Sweden .....	30.1	41.1	58.7	65.1	92.3	100.0	112.9	125.3	115.4	96.9	80.4	77.7	79.1
United Kingdom .....	44.4	54.4	67.7	80.1	92.3	100.0	163.9	218.3	203.1	183.5	159.4	143.9	147.3

- Data not available.

48. Occupational injury and illness incidence rates by industry, United States

Industry and type of case <sup>1</sup>	Incidence rates per 100 full-time workers <sup>2</sup>									
	1976	1977	1978	1979	1980	1981	1982	1983	1984	
<b>PRIVATE SECTOR<sup>3</sup></b>										
Total cases .....	9.2	9.3	9.4	9.5	8.7	8.3	7.7	7.6	8.0	
Lost workday cases .....	3.5	3.8	4.1	4.3	4.0	3.8	3.5	3.4	3.7	
Lost workdays .....	60.5	61.6	63.5	67.7	65.2	61.7	58.7	58.5	63.4	
<b>Agriculture, forestry, and fishing<sup>3</sup></b>										
Total cases .....	11.0	11.5	11.6	11.7	11.9	12.3	11.8	11.9	12.0	
Lost workday cases .....	4.7	5.1	5.4	5.7	5.8	5.9	5.9	6.1	6.1	
Lost workdays .....	83.3	81.1	80.7	83.7	82.7	82.8	86.0	90.8	90.7	
<b>Mining</b>										
Total cases .....	11.0	10.9	11.5	11.4	11.2	11.6	10.5	8.4	9.7	
Lost workday cases .....	5.8	6.0	6.4	6.8	6.5	6.2	5.4	4.5	5.3	
Lost workdays .....	114.4	128.8	143.2	150.5	163.6	146.4	137.3	125.1	160.2	
<b>Construction</b>										
Total cases .....	15.3	15.5	16.0	16.2	15.7	15.1	14.6	14.8	15.5	
Lost workday cases .....	5.5	5.9	6.4	6.8	6.5	6.3	6.0	6.3	6.9	
Lost workdays .....	105.0	111.5	109.4	120.4	117.0	113.1	115.7	118.2	128.1	
General building contractors:										
Total cases .....	14.5	15.0	15.9	16.3	15.5	15.1	14.1	14.4	15.4	
Lost workday cases .....	5.2	5.7	6.3	6.8	6.5	6.1	5.9	6.2	6.9	
Lost workdays .....	100.0	100.2	105.3	111.2	113.0	107.1	112.0	113.0	121.3	
Heavy construction contractors:										
Total cases .....	16.3	16.0	16.6	16.6	16.3	14.9	15.1	15.4	14.9	
Lost workday cases .....	5.5	5.7	6.2	6.7	6.3	6.0	5.8	6.2	6.4	
Lost workdays .....	109.2	116.7	110.9	123.1	117.6	106.0	113.1	122.4	131.7	
Special trade contractors:										
Total cases .....	15.3	15.6	15.8	16.0	15.5	15.2	14.7	14.8	15.8	
Lost workday cases .....	5.6	6.1	6.6	6.9	6.7	6.6	6.2	6.4	7.1	
Lost workdays .....	105.8	115.5	111.0	124.3	118.9	119.3	118.6	119.0	130.1	
<b>Manufacturing</b>										
Total cases .....	13.2	13.1	13.2	13.3	12.2	11.5	10.2	10.0	10.6	
Lost workday cases .....	4.8	5.1	5.6	5.9	5.4	5.1	4.4	4.3	4.7	
Lost workdays .....	79.5	82.3	84.9	90.2	86.7	82.0	75.0	73.5	77.9	
<b>Durable goods</b>										
Lumber and wood products:										
Total cases .....	22.1	22.3	22.6	20.7	18.6	17.6	16.9	18.3	19.6	
Lost workday cases .....	9.7	10.4	11.1	10.8	9.5	9.0	8.3	9.2	9.9	
Lost workdays .....	167.3	178.0	178.8	175.9	171.8	158.4	153.3	163.5	172.0	
Furniture and fixtures:										
Total cases .....	16.9	17.2	17.5	17.6	16.0	15.1	13.9	14.1	15.3	
Lost workday cases .....	6.0	6.0	6.9	7.1	6.6	6.2	5.5	5.7	6.4	
Lost workdays .....	94.5	92.0	95.9	99.6	97.6	91.9	85.6	83.0	101.5	
Stone, clay, and glass products:										
Total cases .....	16.1	16.9	16.8	16.8	15.0	14.1	13.0	13.1	13.6	
Lost workday cases .....	6.4	6.9	7.8	8.0	7.1	6.9	6.1	6.0	6.6	
Lost workdays .....	114.1	120.4	126.3	133.7	128.1	122.2	112.2	112.0	120.8	
Primary metal industries:										
Total cases .....	16.6	16.2	17.0	17.3	15.2	14.4	12.4	12.4	13.3	
Lost workday cases .....	6.3	6.8	7.5	8.1	7.1	6.7	5.4	5.4	6.1	
Lost workdays .....	114.8	119.4	123.6	134.7	128.3	121.3	101.6	103.4	115.3	
Fabricated metal products:										
Total cases .....	18.9	19.1	19.3	19.9	18.5	17.5	15.3	15.1	16.1	
Lost workday cases .....	6.8	7.2	8.0	8.7	8.0	7.5	6.4	6.1	6.7	
Lost workdays .....	109.8	109.0	112.4	124.2	118.4	109.9	102.5	96.5	104.9	
Machinery, except electrical:										
Total cases .....	14.2	14.0	14.4	14.7	13.7	12.9	10.7	9.8	10.7	
Lost workday cases .....	4.6	4.7	5.4	5.9	5.5	5.1	4.2	3.6	4.1	
Lost workdays .....	70.6	69.9	75.1	83.6	81.3	74.9	66.0	58.1	65.8	
Electric and electronic equipment:										
Total cases .....	8.5	8.6	8.7	8.6	8.0	7.4	6.5	6.3	6.8	
Lost workday cases .....	2.8	3.0	3.3	3.4	3.3	3.1	2.7	2.6	2.8	
Lost workdays .....	44.9	46.7	50.3	51.9	51.8	48.4	42.2	41.4	45.0	
Transportation equipment:										
Total cases .....	12.4	11.8	11.5	11.6	10.6	9.8	9.2	8.4	9.3	
Lost workday cases .....	4.7	5.0	5.1	5.5	4.9	4.6	4.0	3.6	4.2	
Lost workdays .....	73.8	79.3	78.0	85.9	82.4	78.1	72.2	64.5	68.8	
Instruments and related products:										
Total cases .....	7.2	7.0	6.9	7.2	6.8	6.5	5.6	5.2	5.4	
Lost workday cases .....	2.4	2.4	2.6	2.8	2.7	2.7	2.3	2.1	2.2	
Lost workdays .....	36.7	37.4	37.0	40.0	41.8	39.2	37.0	35.6	37.5	
Miscellaneous manufacturing industries:										
Total cases .....	11.7	11.5	11.8	11.7	10.9	10.7	9.9	9.9	10.5	
Lost workday cases .....	4.0	4.0	4.5	4.7	4.4	4.4	4.1	4.0	4.3	
Lost workdays .....	59.4	58.7	66.4	67.7	67.9	68.3	69.9	66.3	70.2	

See footnotes at end of table.



48. Continued— Occupational injury and illness incidence rates by industry, United States

Industry and type of case <sup>1</sup>	Incidence rates per 100 full-time workers <sup>2</sup>								
	1976	1977	1978	1979	1980	1981	1982	1983	1984
<b>Nondurable goods</b>									
Food and kindred products:									
Total cases .....	19.3	19.5	19.4	19.9	18.7	17.8	16.7	16.5	16.7
Lost workday cases .....	8.0	8.5	8.9	9.5	9.0	8.6	8.0	7.9	8.1
Lost workdays .....	123.8	130.1	132.2	141.8	136.8	130.7	129.3	131.2	131.6
Tobacco manufacturing:									
Total cases .....	10.0	9.1	8.7	9.3	8.1	8.2	7.2	6.5	7.7
Lost workday cases .....	4.1	3.8	4.0	4.2	3.8	3.9	3.2	3.0	3.2
Lost workdays .....	62.5	66.7	58.6	64.8	45.8	56.8	44.6	42.8	51.7
Textile mill products:									
Total cases .....	10.5	10.2	10.2	9.7	9.1	8.8	7.6	7.4	8.0
Lost workday cases .....	2.7	2.9	3.4	3.4	3.3	3.2	2.8	2.8	3.0
Lost workdays .....	55.5	57.4	61.5	61.3	62.8	59.2	53.8	51.4	54.0
Apparel and other textile products:									
Total cases .....	6.7	6.7	6.5	6.5	6.4	6.3	6.0	6.4	6.7
Lost workday cases .....	1.9	2.0	2.2	2.2	2.2	2.2	2.1	2.4	2.5
Lost workdays .....	31.0	31.7	32.4	34.1	34.9	35.0	36.4	40.6	40.9
Paper and allied products:									
Total cases .....	13.7	13.6	13.5	13.5	12.7	11.6	10.6	10.0	10.4
Lost workday cases .....	4.7	5.0	5.7	6.0	5.8	5.4	4.9	4.5	4.7
Lost workdays .....	94.8	101.6	103.3	108.4	112.3	103.6	99.1	90.3	93.8
Printing and publishing:									
Total cases .....	6.8	6.8	7.0	7.1	6.9	6.7	6.6	6.6	6.5
Lost workday cases .....	2.6	2.7	2.9	3.1	3.1	3.0	2.8	2.9	2.9
Lost workdays .....	40.3	41.7	43.8	45.1	46.5	47.4	45.7	44.6	46.0
Chemicals and allied products:									
Total cases .....	8.2	8.0	7.8	7.7	6.8	6.6	5.7	5.5	5.3
Lost workday cases .....	3.1	3.1	3.3	3.5	3.1	3.0	2.5	2.5	2.4
Lost workdays .....	50.6	51.4	50.9	54.9	50.3	48.1	39.4	42.3	40.8
Petroleum and coal products:									
Total cases .....	7.9	8.1	7.9	7.7	7.2	6.7	5.3	5.5	5.1
Lost workday cases .....	3.2	3.3	3.4	3.6	3.5	2.9	2.5	2.4	2.4
Lost workdays .....	62.5	59.2	58.3	62.0	59.1	51.2	46.4	46.8	53.5
Rubber and miscellaneous plastics products:									
Total cases .....	16.8	16.8	17.1	17.1	15.5	14.6	12.7	13.0	13.6
Lost workday cases .....	7.1	7.6	8.1	8.2	7.4	7.2	6.0	6.2	6.4
Lost workdays .....	113.3	118.1	125.5	127.1	118.6	117.4	100.9	101.4	104.3
Leather and leather products:									
Total cases .....	11.6	11.5	11.7	11.5	11.7	11.5	9.9	10.0	10.5
Lost workday cases .....	4.1	4.4	4.7	4.9	5.0	5.1	4.5	4.4	4.7
Lost workdays .....	69.0	68.9	72.5	76.2	82.7	82.6	86.5	87.3	94.4
<b>Transportation and public utilities</b>									
Total cases .....	9.8	9.7	10.1	10.0	9.4	9.0	8.5	8.2	8.8
Lost workday cases .....	5.0	5.3	5.7	5.9	5.5	5.3	4.9	4.7	5.2
Lost workdays .....	94.0	95.9	102.3	107.0	104.5	100.6	96.7	94.9	105.1
<b>Wholesale and retail trade</b>									
Total cases .....	7.5	7.7	7.9	8.0	7.4	7.3	7.2	7.2	7.4
Lost workday cases .....	2.8	2.9	3.2	3.4	3.2	3.1	3.1	3.1	3.3
Lost workdays .....	43.2	44.0	44.9	49.0	48.7	45.3	45.5	47.8	50.5
Wholesale trade:									
Total cases .....	8.1	8.5	8.9	8.8	8.2	7.7	7.1	7.0	7.2
Lost workday cases .....	3.3	3.6	3.9	4.1	3.9	3.6	3.4	3.2	3.5
Lost workdays .....	51.8	52.5	57.5	59.1	58.2	54.7	52.1	50.6	55.5
Retail trade:									
Total cases .....	7.2	7.4	7.5	7.7	7.1	7.1	7.2	7.3	7.5
Lost workday cases .....	2.6	2.7	2.8	3.1	2.9	2.9	2.9	3.0	3.2
Lost workdays .....	39.7	40.5	39.7	44.7	44.5	41.1	42.6	46.7	48.4
<b>Finance, insurance, and real estate</b>									
Total cases .....	2.0	2.0	2.1	2.1	2.0	1.9	2.0	2.0	1.9
Lost workday cases .....	.7	.8	.8	.9	.8	.8	.9	.9	.9
Lost workdays .....	11.6	10.4	12.5	13.3	12.2	11.6	13.2	12.8	13.6
<b>Services</b>									
Total cases .....	5.3	5.5	5.5	5.5	5.2	5.0	4.9	5.1	5.2
Lost workday cases .....	2.0	2.2	2.4	2.5	2.3	2.3	2.3	2.4	2.5
Lost workdays .....	38.4	35.4	36.2	38.1	35.8	35.9	35.8	37.0	41.1

<sup>1</sup> Total cases include fatalities.

<sup>2</sup> The incidence rates represent the number of injuries and illnesses or lost workdays per 100 full-time workers and were calculated as: (N/EH) X 200,000, where:

N = number of injuries and illnesses or lost workdays.

EH = total hours worked by all employees during calendar year.  
200,000 = base for 100 full-time equivalent workers (working 40 hours per week, 50 weeks per year.)

<sup>3</sup> Excludes farms with fewer than 11 employees since 1976.

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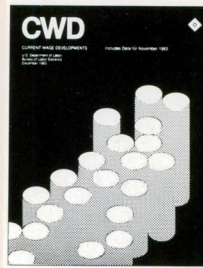
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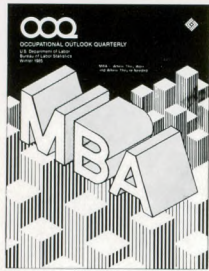
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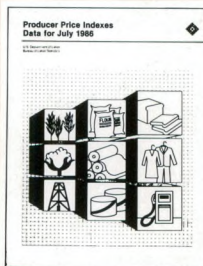
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