

Managed Care Plans and Managed Care Features: Data from the EBS to the NCS

In the 1990s, managed care plans and features had a prominent role in the discussion of the design and efficiency of health care plans. In 1997, 95 percent of all full-time employees in medium and large private establishments participated in plans with a managed care emphasis.

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The Health Insurance Association of America defines managed care as a collection of interdependent systems that integrate the financing and delivery of appropriate health care services to covered individuals.¹ Since the early 1980s, the Bureau of Labor Statistics (BLS) has captured data on managed care through its compensation surveys—initially through the Employee Benefits Survey (EBS)² and now through the National Compensation Survey (NCS). This article presents two distinct perspectives of managed care: Managed care plans and managed care features.³

Managed care plans serve as an alternative to traditional health care plans that do not restrict a patient's choice of providers. Managed care plans enter into arrangements with selected health care providers, who agree to furnish a comprehensive set of services and to implement cost containment and quality measures. Managed care features are designed to limit costs and improve the efficiency of service by setting incentives on specific plan pro-

visions. For example, one managed care feature could lower costs by reducing nonemergency weekend hospital admissions. (See box for a general list of managed care features and their definitions.)

Using EBS data for selected years between 1991 and 1997, this article discusses managed care plans, managed care features, and changes to be expected in future NCS surveys. The data come from medium and large private establishments—those with 100 employees or more—that represent, on average, 33 million full-time employees. Farms and private households are excluded.

The 1997 EBS concludes the publication of data on medium and large private establishments under the current survey format. The EBS will publish two interim products for 1999 and 2000 before becoming fully integrated into the NCS. After that time, BLS will no longer conduct independent surveys of medium and large private establishments, small private establishments, and State and local governments.

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Glossary of Managed Care Terms

Listed below are some of the most common managed care features as defined by the International Foundation of Employee Benefits in *Employee Benefit Plans: A Glossary of Terms, 9th edition*, and BLS. Definitions from BLS have the reference “by BLS” next to the term defined.

Case management. A utilization management technique that focuses on coordinating a number of services needed by clients. It includes a standardized, objective assessment of client needs and the development of an individualized service or care plan that is based on the need assessment and is goal oriented.

Claims review. In health care prepayment, the routine examination by a carrier or intermediary of the claim submitted to it for payment or for predetermination of benefits; may include determination of eligibility, coverage of service, and plan liability. In quality assurance, examination by an organization of claims as part of a quality review or utilization process.

Concurrent review. The process by which hospital admissions for elective and emergency treatment are certified for appropriateness at the time of service and by which continued stays are verified for medical necessity and level of care. According to the *Handbook of Employee Benefits, 3rd edition*, by Jerry S. Rosenbloom (Burr Ridge, IL, Irwin, 1992), concurrent review is an “onsite” review, and continued stay review is an “offsite” review.

Continued stay review. A review and an initial determination by a utilization review committee during a patient’s hospitalization of the necessity and appropriateness of continuation of the patient’s stay at a hospital level of care; sometimes called “recertification.”

Discharge planning. A centralized, coordinated program developed by a hospital to ensure that each patient has a planned program for needed continuing or followup care.

Generic prescription drugs (by BLS). Bioequivalent (same active chemical composition) to brand name drugs, but reimbursed at a higher payment level.

Hospital bill audit (by BLS). A provision that gives participants an incentive to find overcharges in their hospital bill. Most plans give the participant a percentage of the money saved by the plan sponsor, up to a specified maximum.

Medical case management (by BLS). An option, often offered by insurance companies, that provides coordinators to handle high cost claims and recommend specialized care and services targeted to an individual’s treatment goals and needs. Medical case management is most often used to deal with catastrophic illnesses. The medical case management coordinator helps to oversee overall management of the patient, from the onset of the illness or injury into acute care hospitalization, specialized care programs, and followup treatment.

Nonemergency weekend admission (by BLS). A process that reduces or denies coverage for nonemergency weekend admissions.

Preadmission certification (by BLS). An authorization given by a health care provider to a benefit recipient prior to hospitalization or before the delivery of certain health care benefits. Failure to obtain a preadmission certification in nonemergency situations usually reduces or eliminates the health care provider’s obligation to pay for services rendered.

Preadmission testing. A plan benefit designed to encourage patients to obtain needed diagnostic services on an ambulatory basis before a nonemergency hospital admission in order to reduce hospital length of stay.

Preventive care. Comprehensive care emphasizing priorities for prevention, early detection, and early treatment of conditions. Preventive care generally includes routine physical examinations, immunization, and “well-person” care.

Retrospective review. A traditional form of utilization review. The patient’s chart is reviewed after the fact to determine whether the treatment provided was medically necessary.

Second surgical opinion. A provision that encourages or requires participants to obtain the opinion of another doctor after a physician has recommended that nonemergency or elective surgery be performed. Programs may be voluntary or mandatory in that reimbursement is reduced or denied if the participant does not obtain the second opinion. Plans usually require that such opinions be obtained from board-certified specialists with no personal or financial interest in the outcome.

Utilization management. A generic term for the preadmission certification, concurrent review, and retrospective review techniques used to evaluate health care on the basis of appropriateness, necessity, and quality.

Utilization review. A cost-control mechanism for reviewing the appropriateness and the quality of care provided to patients. Utilization review may come before (prospective), at the same time as (concurrent), or after (retroactive) services are rendered.

Table 1. **Average monthly employee contribution, full-time employees, medium and large private establishments,¹ selected years, 1991-97**

Coverage type	1991	1993	1995	1997
All plans				
Individual coverage	\$26.60	\$31.55	\$33.92	\$39.14
Family coverage	96.97	107.42	118.33	130.07
Non-HMO plans ²				
Individual coverage	25.84	31.48	32.91	41.69
Family coverage	91.52	102.48	112.18	132.37
HMO plans				
Individual coverage	29.23	31.77	36.18	34.28
Family coverage	118.19	121.84	132.66	125.79

¹ Medium and large private establishments are those with 100 employees or more.

² Non-HMO plans include traditional fee-for-service plans, preferred provider plans, and exclusive provider plans.

Employer health care costs and managed care

In recent decades, the United States has experienced an overall rise in health care expenditures and employer health care costs.⁴ Trends and developments in health care that affect employer-provided health care plans are a major concern, because most Americans receive medical coverage through their jobs.⁵

The Employment Cost Index (ECI) and the Employer Costs for Employee Compensation (ECEC), both BLS surveys, have shown a rapid increase in benefit costs since the early 1980s.⁶ According to the ECI, the rate of growth in benefit costs has risen and fallen at different times over the last two decades. (See chart 1.) Peaking in 1983, it slowed in the mid-1980s, only to rise sharply between 1987 and 1988. Between 1989 and 1996, it decreased again and leveled off thereafter. However, since early 1999, the percent change in benefit costs has been rising again. Basically, the percent change in benefit costs rose faster than the percent change in the cost of wages and salaries from 1982 to 1994. Over the next 5 years, the change in benefit costs was less than the percent change in the cost of wages and salaries.

March 2001 ECEC data indicate that 27.1 percent of total employer costs for employee compensation was benefit costs. Health care costs accounted for 5.6 percent of compensation costs, a

greater share than most benefit costs.⁷ Unpublished data from the ECI show that health care costs have driven overall benefit costs during the last two decades. (See chart 2.) Like overall benefit costs, these data for health care in private industry peaked in the early 1980s, slowed during most of the 1990s, and rose again in the late 1990s.^{8, 9}

According to the 1995 *Report on the American Workforce*, the rapid increase in health care costs has had an impact on employer-provided plans.¹⁰ As a result of employer cost concerns, employees have seen a reduction in coverage, an increase in their contributions towards plans, growth in the availability of plans aimed at reducing costs (managed care plans), and larger numbers of managed care features within plans.

As employees began paying higher premiums for health care coverage, they also began shifting toward plans that restrict their choice of providers¹¹; typically, these plans have lower premiums.¹² However, employees who remained in plans that did not restrict the choice of providers also saw an increased use of measures to limit plan costs. Nevertheless, employee premiums have increased for all types of plans. (See table 1.)

Since 1982, the EBS has provided estimates of managed care plans and plan features. The EBS has captured data on the three types of plans that

are considered managed care—health maintenance organizations, preferred provider organizations, and exclusive provider organizations¹³—as well as traditional plans. The type of data collected on managed care features throughout the years has varied considerably. For example, the EBS has captured data on provisions for preadmission testing, second surgical opinions, hospital audits, nonemergency weekend admissions, and preadmission certification. These data have been expanded or limited by survey year, and the published estimates reflect these changes.

To keep the survey current, BLS has based changes in EBS survey design primarily on emerging trends in health care. For example, when health-care costs increased in the 1980s, BLS responded by capturing details of cost containment measures in the EBS.¹⁴ In 1982, BLS started publishing EBS estimates of the percent of covered workers in plans that required second surgical opinions; in 1985, other selected managed care features, such as higher reimbursement for generic prescription drugs, were added; and, in the 1990s, data on penalties for noncompliance with the preadmission certification were captured.

Managed care plans and features

Throughout the 1990s, more than 90 percent of full-time employees with medical coverage were in plans with managed care features. (See table 2.) During this period, participation in traditional health care plans with managed care features decreased, while participation in managed care plans increased. These two approaches—traditional plans with special features versus managed care plans—focus on different ways of managing care.

Traditional fee-for-service plans. Participation in traditional fee-for-service plans decreased in the mid-1990s from 66 percent of full-time employees with medical care coverage in 1991 to 26 percent in 1997. This type of health care plan pays incurred expenses for specific medical procedures. Reim-

Chart 1. Twelve-month percent change in the Employment Cost Index for wages and salaries and benefit costs, quarterly data, 1982-2000

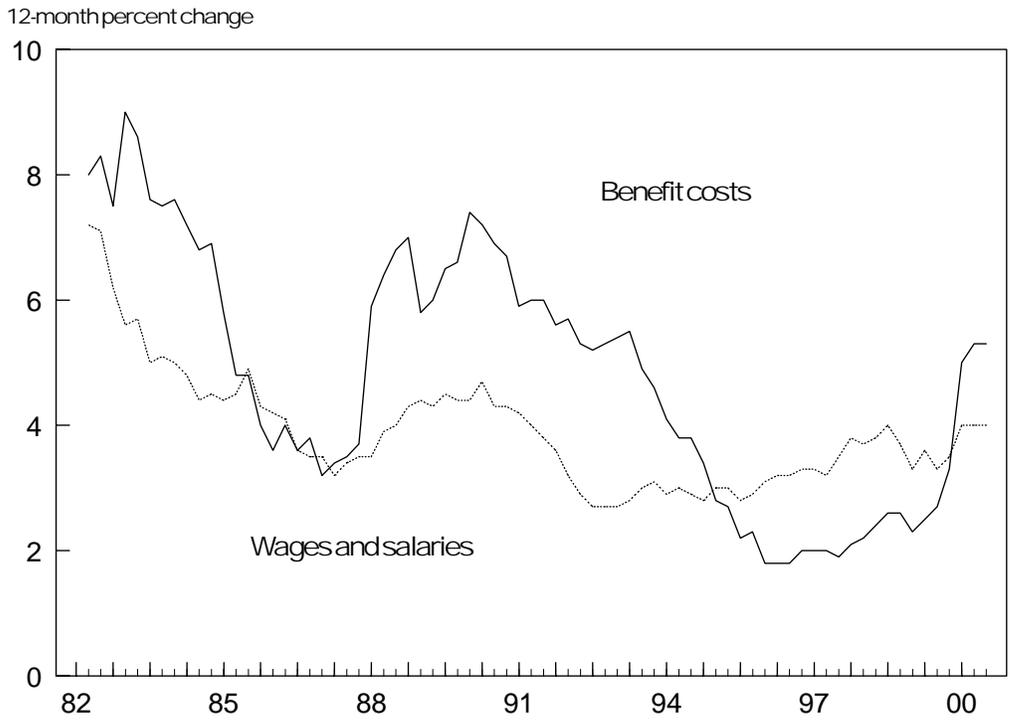


Chart 2. Twelve-month percent change in the Employment Cost Index for total benefit costs and health care costs, quarterly data, 1982-2000

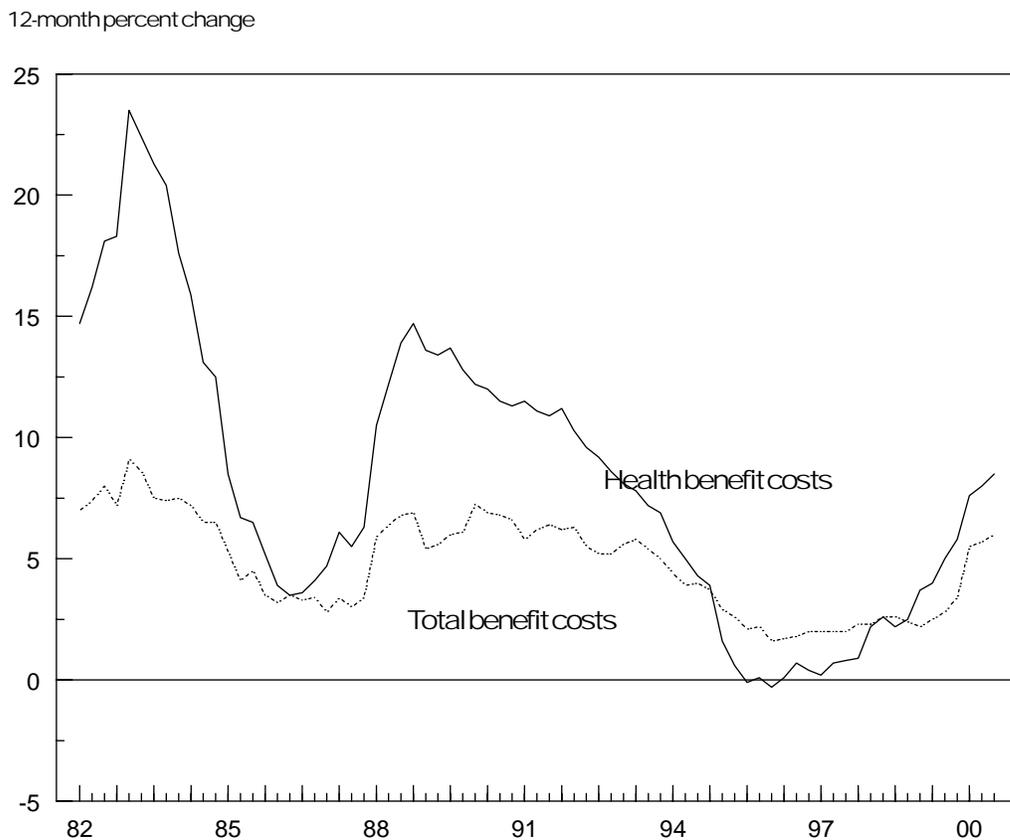


Table 2. **Percent of full-time medical care participants with managed care features by plan type, medium and large private establishments,¹ selected years, 1991-97**

Managed care features by plan type	1991	1993	1995	1997
With managed care features	93	90	91	95
Traditional fee-for-service ²	59	40	28	21
Preferred provider organization	16	26	34	40
Exclusive provider organization	(³)	1	1	1
Prepaid health maintenance organization	17	23	27	33
Without managed care features	7	10	9	5
Not determinable	-	-	-	1

¹ Medium and large private establishments are those with 100 employees or more.

² Traditional fee-for-service plans with managed care features.

³ Less than 0.5 percent.

NOTE: Because of rounding, sums of individual items may not equal totals. Dash indicates no employees in this category.

bursements for these expenses are made directly to health care providers or to plan participants by the health care plan, often a Blue Cross/Blue Shield organization, or by the employer who self-insures the plans.

In 1997, 21 percent of all full-time employees with medical care coverage were in traditional fee-for-service plans with managed care features, down from 59 percent in 1991. (Five percent of all full-time employees with medical care coverage were in traditional plans without managed care features in 1997, down slightly from seven percent in 1991.) Required preadmission certification and second surgical opinion were the most prevalent managed care features used by these plans.

Preferred provider organizations (PPOs). These plans are similar to traditional fee-for-service plans in that participants' incurred expenses are paid after services are rendered. PPOs have grown in popularity over the last decade. Forty percent of full-time health care participants were enrolled in this type of plan in 1997, up from sixteen percent in 1991. (See table 2.) As in traditional fee-for-service plans, participants can choose any health care provider, such as a hospital or physician, but they receive higher benefits for services rendered by designated providers. Participants who choose designated providers might have lower

annual deductibles, for example, or lower catastrophic maximum limits than those who select undesignated providers.

Health maintenance organizations (HMOs). These plans provide a prescribed set of benefits to participants for a prepaid fee. Typically, HMOs are independent organizations that finance and administer health care services. These plans require the participant to seek care only from specific care providers. Though restricted, most of the health care services in these plans are covered in full.

In 1997, 33 percent of participants in health care plans were enrolled in HMOs. These plans have programs that arrange referral services, hospital admissions, and other arrangements on the participant's behalf that are similar to preadmission certification, concurrent review, and utilization review found in non-HMOs. Through these programs, HMOs control cost while administering and monitoring the health care of the patient.

By definition, HMOs include managed care features as part of their structure; the EBS, however, did not tabulate these features. (The EBS published data on managed care features only for traditional fee-for-service plans in 1991. In 1993, the EBS expanded its publication of such features to cover all non-HMO plans.) Nearly all HMOs have hospital admissions and referral ser-

vices policies. In HMOs, participants select a primary care physician who acts as their health care gatekeeper. These physicians arrange hospitalizations on the patient's behalf and coordinate other treatments as needed.

Managed care features: penalties for noncompliance

Traditionally, the EBS captured managed care features that were triggered by the participant, and not by the provider. Participants in plans with managed care features could incur a penalty by choosing not to follow managed care rules. For example, some plans have arrangements with the provider to obtain a preadmission certification; participant noncompliance may result in a reduction in benefits. The most prominent managed care features captured by the EBS that have participant penalties were second surgical opinions and preadmission certification. (See table 3 for the percent of non-HMO participants in plans with specified managed care features.)

In 1997, 50 percent of non-HMO participants had a provision for second surgical opinion; 18 percent of those had a penalty for noncompliance.¹⁵ A typical penalty might be a reduction of the coinsurance for a surgery, with the plan paying benefits at 50 percent rather than 80 percent, or the imposition of a deductible for the surgery, if a second opinion was not obtained.

Three out of five full-time medical care plan participants in non-HMOs—traditional fee-for-service plans, preferred provider organizations, and exclusive provider organizations—were required to get preadmission certification. Typically, plans reduce benefits if participants fail to obtain a preadmission certification. A penalty, such as reduced coinsurance or an added deductible, could apply to those not obtaining the certification. Preadmission certification has become the most prominent managed care feature in non-HMO plans for which data are captured by the EBS. Specific details for preadmission certification penalties have been published only since 1993. (See table 4.)

Table 3. Percent of full-time medical care participants in non-HMO plans by managed care features, medium and large private establishments,¹ selected years, 1993-97

Managed care feature	1993	1995	1997
Preadmission certification	74	65	59
Second surgical opinion	75	53	50
Preadmission testing	51	42	42
Utilization and concurrent review	42	38	34
Nonemergency weekend admission	14	10	11
Hospital bill audit	14	7	8
Other	-	(²)	1

¹ Medium and large private establishments are those with 100 employees or more.

² Less than 0.5 percent.

NOTE: Dash indicates no employees in this category.

Table 4. Percent of full-time medical care participants in non-HMO plans with preadmission certification penalties, medium and large private establishments,¹ selected years, 1993-97

Preadmission certification penalty	1993	1995	1997
With penalty	97	96	97
Reduced coinsurance ²	44	37	37
Separate deductible for hospital admission ...	35	34	38
No benefit	5	4	3
Combination of separate deductible and reduced coinsurance	2	2	2
Other	3	4	3
Penalty not determinable ³	8	14	14
Without penalty	3	4	3

¹ Medium and large private establishments are those with 100 employees or more.

² In 1993 and 1995, selected coinsurance penalties were identified.

³ In these cases there is a penalty, but the type is not identified.

NOTE: Because of rounding, sums of individual items may not equal totals.

In 1997, 97 percent of non-HMO participants in plans with a preadmission certification feature were subject to penalties for not obtaining the certification. Many of them had to pay a separate deductible in such circumstances. For example, some participants might have to pay a \$300 deductible per admission before plan benefits begin. However, other participants had a reduced coinsurance benefit if the hospitalization was not certified, and a few lost all benefits in such cases. The major forms of penalties for non-compliance with preadmission certification requirements have remained consistent over the past decade. In 1993, 1995, and 1997, the most frequently observed penalties were a reduced coinsurance or a separate hospital deductible.

Managed care and the NCS

In 1996, BLS introduced the National Compensation Survey (NCS).¹⁶ The EBS is in the final phase of full integration into the NCS. The two major differences between the NCS and the EBS in the area of managed care are the expansion of managed care plan types and the reduction in the types of managed care features collected.

Managed care plans. Point-of-service plans are a type of HMO plan that allows enrollees to receive services outside the network at a higher cost. These plans operate as HMOs do: participants have to elect a primary care physician to coordinate their care. Nineteen percent of all HMO participants were in plans with point-of-service features in 1997. In the health care field,

there has been a recent trend toward identifying a point-of-service option as a separate plan type or considering such plans to be PPOs. Nevertheless, the EBS has always classified these plans as HMOs, and the NCS will continue to do so. Beginning in 2001, the NCS will expand publication of the data available on HMOs to reflect this recent trend by dividing HMOs into two categories: traditional HMOs and point-of-service HMOs.

This division of HMOs into two categories will allow more detailed analysis and comparisons among plan characteristics and premiums. For example, NCS data should answer questions such as: are employees' plan premiums higher for point-of-service HMOs than for traditional HMOs? And, how do plan provisions differ among managed care plans? The NCS data also will allow further comparisons among plan types and provisions, such as physician office visits and prescription drug copayments.

Managed care features. BLS evaluated plan documents provided by respondents to determine how well they described managed care features.¹⁷ The main objective of this evaluation was to determine how the NCS should proceed regarding the collection and publication of managed care features. As expected, plan documents in most cases described various managed care features, such as preadmission certification, medical case management, retrospective review, and concurrent review. Descriptions of managed care features were inconsistent among the plan documents evaluated. Two plans may use the same name or label to describe different features, or different names to describe the same feature. (One example of this latter case might be "concurrent review" and "utilization review.") In addition, plan documents were inconsistent in the types of managed care benefits described. These reasons, among others, prompted BLS to streamline the managed care features that NCS will collect. The plan documents—the main source of provision data—are not a reliable source of man-

aged care descriptions and definitions.

The NCS will collect detailed information on only two managed care features—preadmission certification, which remains the most frequent managed care feature used, and utilization review. Even though utilization review was the fourth most prominent feature in 1997, the NCS will continue to cap-

ture this feature because it functions as the care monitor once the patient is admitted to the hospital.¹⁸

Conclusion

The NCS data will allow comparisons between benefit provisions and costs because all data will reside on a single

database.¹⁹ The NCS will continue to monitor the health care industry and expects to capture future developments in managed care plans and features. Because of the flexible design of the NCS, changes will be incorporated into the survey as BLS strives to produce the most relevant and accurate data available. ■

¹ See *Source Book of Health Insurance Data, 1999-2000* (Washington, Health Insurance Association of America, 1999), p. 52.

² The Employee Benefits Survey (EBS) was an annual survey that covered the incidence and provisions of employee benefit plans. BLS published data from this survey from 1979 to 1998.

³ For prior articles on this or similar topics, see Thomas P. Burke and Rita S. Jain, "Trends in employer-provided health care benefits," *Monthly Labor Review*, February 1991, pp. 24-30; Stephanie L. Hyland, "Health care benefits show cost containment strategies," *Monthly Labor Review*, February 1992, pp. 42-43; Thomas P. Burke, "Alternatives to hospital care under employee benefit plans," *Monthly Labor Review*, December 1991, pp. 9-15; and Robert B. Grant, "Outpatient surgery: helping to contain health care costs," *Monthly Labor Review*, November 1992, pp. 33-36. These articles all are reprinted in *Employee Benefits Survey: A BLS Reader*, Bulletin 2459 (Bureau of Labor Statistics, February 1995).

⁴ For more information, see Hilery Simpson, "Are Health Industry Compensation Costs a Factor Influencing Employer Health Care Costs?" *Compensation and Working Conditions*, winter 1997, pp. 3-11.

⁵ See "Health Care and the Workplace: Recent Trends and Current Status," *Report on the American Workforce, 1995* (Washington, U.S. Department of Labor, 1995), ch. 3.

⁶ The Employment Cost Index (ECI) is a measure of the change in the cost of labor, free from the influence of employment shifts among occupations and industries. The compensation series includes changes in wages and salaries and employer costs for employee benefits. The wage and salary series and the benefit cost series provide the changes for the two components of compensation.

The Employer Costs for Employee Compensation (ECEC) program measures the average cost per employee hour worked that employers pay for wages and salaries and benefits.

For more information about the ECI and the ECEC, see the BLS Web site at <http://stats.bls.gov/ncs/ect>.

⁷ The most costly benefit components were legally required benefits, such as Social Security, and paid leave, such as vacations. These benefits accounted for 8.3 and 6.6 percent, respectively, of the total employer

costs for employee compensation.

⁸ The 12-month percent changes in employer costs per hour worked for health care in private industries from the ECI are not published as part of official estimates for various reasons: (1) variances are not calculated for the estimates; (2) there are fewer observations supporting these estimates than there are for total estimates; (3) the employer nonresponse rate is substantial; and (4) employers sometimes report a combined cost for various benefits including health care, and such combined costs are allocated by BLS to the individual benefits.

⁹ From 1980 to 1998, the percent change in health insurance costs increased over 3 times as much as the percent change in wages and salaries, and nearly 3 times as much as the percent change in other ECI benefits. See Albert E. Schwenk, "Trends in Health Insurance Costs," *Compensation and Working Conditions*, December 1996, pp. 31-33; and Albert E. Schwenk, "Trends in Health Insurance Costs," *Compensation and Working Conditions*, spring 1999, pp. 24-28.

¹⁰ See "Reactions to Rising Health Care Costs," *Report on the American Workforce, 1995* (Washington, U.S. Department of Labor, 1995), p. 110.

¹¹ For a comparison of the rise of employee medical care contributions and the rate of inflation, see Allan P. Blostin and Jordan N. Pfuntner, "Employee Medical Care Contributions on the Rise," *Compensation and Working Conditions*, spring 1998, pp. 46-51.

¹² According to the *KPMG Survey of Employer-Sponsored Health Benefits in 1998*, traditional plans required larger premiums for single and family coverage than did HMOs and PPOs. In 1998, conventional plans averaged annual premiums of \$2,280 for single coverage and \$5,832 for family coverage. In the same year, the average annual premium for single coverage for HMOs and PPOs was \$1,920 and \$2,100, respectively, while the average annual premium for family coverage was \$5,280 and \$5,604, respectively. See Jon Gabel and Kimberly Hurst, "Health Benefits in 1998," *KPMG Survey of Employer-Sponsored Health Benefits in 1998* (KPMG Peat Marwick LLP, June 1998), p. 13.

¹³ Exclusive provider organizations are groups that contract to provide comprehensive medical services. These plans are a type of fee-for-service plan that requires participants to use plan providers to receive cover-

age. There is no coverage for care received from a non-network provider.

¹⁴ The International Foundation of Employee Benefits defines cost containment as "activities aimed at holding down the cost of medical care or reducing its rate of increase," according to *Employee Benefit Plans: A Glossary of Terms, 9th edition* (Brookfield, WI, International Foundation of Employee Benefits, 1997), p. 36. For more information on employer containment of health insurance costs, plan types, and cost containment features, see John J. Kane, Allan P. Blostin, and Jordan N. Pfuntner, "Changing Survey Strategies in the Evolution of Health Care Plans," *Compensation and Working Conditions*, September 1996, pp. 3-10.

¹⁵ For more information, see *Employee Benefits in Medium and Large Private Establishments, 1997*, Bulletin 2517 (Bureau of Labor Statistics, 1999), table 73, p. 65.

¹⁶ The National Compensation Survey produces comprehensive compensation data. It combines data previously published by four separate programs—Occupational Compensation Program, Employment Cost Index, Employer Costs for Employee Compensation, and Employee Benefits Survey.

¹⁷ Respondents provide BLS with what is known as summary plan descriptions. These plan documents detail plan provisions and participants' responsibilities.

¹⁸ The NCS will not capture data on second surgical opinion provisions. These provisions are becoming less relevant in medical care plans because patients are not required to follow the advice of the second opinion. In addition, some plan documents are not as detailed as others in terms of managed care features. Still other plans might combine second surgical opinions with the regular preadmission certification process. For more information, see Allan P. Blostin and Iris S. Díaz, "Health Insurance Provisions Captured by the EBS and the NCS," *Compensation and Working Conditions*, spring 1999, p. 16.

¹⁹ Having all data in one database will allow the publication of more estimates. This does not imply that every element collected will be published, however. The BLS assures a high degree of voluntary cooperation by keeping confidentiality agreements. Data are combined and released in summary tables, analyses, and reports. For more information on BLS survey procedures, see *BLS Handbook of Methods*, Bulletin 2490 (Bureau of Labor Statistics, April 1997), pp. 1-2.