Conventional health insurance: A decade later

by Steven DiCarlo and Jon Gabel

In this article, the 1987 conventional health plans are examined and 1987 group health insurance is compared with that of 1977. The source of information for 1987 is the national survey of 771 private and public employers conducted by the Health Insurance Association of America. Data for 1977 are from the National Medical Care Expenditures Survey. Findings show that conventional health plans' share of the group market declined from 95 to 73 percent during the decade; the majority of Americans covered by conventional group insurance are now enrolled in a plan that self-insures; prospective utilization review grew dramatically after 1984; and patient cost sharing increased, but not as significantly as conventional wisdom holds.

Introduction

In 1977, the National Center for Health Services Research conducted the most comprehensive survey of health insurance and use of health care services in this Nation's history. From this survey emerged a vivid picture of the American health care system in the 1970's—a system almost entirely financed by conventional insurance (defined as non-health maintenance and non-preferred provider organization health plans). It is from this survey that much of our understanding of the economics of health care has been derived.

In this article, after a decade of extraordinary change in American health care, we examine the 1987 conventional health plans. Where there are comparable data, we compare private health insurance of 1987 with that of 1977. The focus is on conventional health insurance, the source of protection for approximately 96 percent of Americans in 1977 and 73 percent in 1987 who secured health insurance through their employers.

Conventional fee-for-service insurance has been the traditional form of health coverage for Americans. This type of arrangement has few incentives for the provider or the patient to minimize the cost of treatment. Historically, insurers reimbursed providers' charges with few questions asked. The insurer's role was simply to forecast expenditures, determine risk, collect premiums, and pay the bills.

As health care costs escalated, employers and insurers turned increasingly to health maintenance organizations (HMO's) and preferred provider organizations (PPO's) as the means of controlling costs (Gabel et al., 1988; Rice et al., 1989). Patients in these plans no longer have unrestricted access to physicians and hospitals, and they almost always have to secure approval for admission to a hospital. HMO's and PPO's may review other steps in the medical treatment to make sure the treatment is necessary. If a patient does not follow guidelines, the HMO or PPO may deny payment (totally or partially), and the patient may face larger out-of-pocket costs.

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This article is organized as follows:

- We review the health insurance data available in the past decade.
- We review the methodology for the Health Insurance Association of America (HIAA) health benefit survey.
- We compare characteristics of conventional health insurance plans of 1987 with those of 1977.
- We take a closer look at conventional plans of 1987 according to their sponsorship and employer size.

Our conclusion assesses the future of conventional insurance.

Need for new information

To examine 1977 conventional health insurance, we turn to the landmark National Medical Care Expenditures Survey (NMCES)—a household interview survey during which family health insurance coverage and use and costs of services were investigated (Farley, 1986). NMCES supplemental surveys explored in detail additional aspects of each person's health coverage. During a smaller survey, the Employer Health Insurance Cost Survey (EHICS), employment-related health insurance plans were investigated by interviewing the employers of the individuals in the household survey (Taylor and Lawson, 1981). EHICS includes information about the availability of health coverage for employees, the cost of premiums, and how these were distributed between the employer and employee. For our analysis of health insurance in 1977, we used only the employer-based results from the EHICS. Data are on a national and a regional basis.

In recent years, health care analysts have relied on three sources of information for trends in health benefit coverage—consulting firm studies, coalition studies, and the Bureau of Labor Statistics (BLS) annual survey of mid-sized and large employers (Jensen et al., 1987). All of these studies have serious limitations, however, when one extrapolates the results to the U.S. population.

Consulting firms generally select their samples from their client base. They often fail to report their response rate or assess the representativeness of their

sample. Thus, samples tend to be subject to selection bias and lack the ability to extrapolate findings to the entire U.S. population.

Several local employer communities have formed coalitions. These coalitions have, at times, commissioned studies of employer-sponsored health insurance. Coalition studies are usually better statistically designed than consulting firm studies but tend to focus on small regions of the country, thereby hampering the ability to extrapolate the findings to national figures.

The BLS annual survey is the best available source of national data. However, its major flaw is that the sample includes only medium- and large-sized private firms. Thus, employers that have fewer than 100 employees are not represented in the study. There is ample evidence to suggest that small employer premiums and benefit packages differ from those of larger employers and that public employers offer richer benefit packages than do private ones (Small Business Administration, 1987). Moreover, small employers make up the majority of the employers in the country (U.S. Bureau of the Census, 1987). Thus, a substantial portion of the group insurance marketplace is omitted from the BLS survey, thereby biasing any extrapolations to the population as a whole.

Health benefit survey

The source of information for 1987 is the national health benefit survey of 771 private and public employers conducted by the Health Insurance Association of America (HIAA) in conjunction with the Johns Hopkins University and the University of North Carolina in the spring of 1987.

Attempting to remedy many of the flaws of the post-NMCES surveys, we designed the HIAA survey with the objective of deriving a representative sample from which to draw conclusions about the Nation's employment-related health insurance population. We stratified the sample according to region, the firm's total number of employees, and private-public status. Because we were interested primarily in firms that offered health benefits to their employees, we undersampled small employers (those with fewer than 100 employees) and disproportionately selected large employers (those with 100 or more employees). Many small employers do not offer health coverage to their employees, and large employers, though fewer in number, cover a plurality of employees with group coverage (Employee Benefits Research Institute, 1988).

The survey questionnaire asked about the firm's largest conventional, HMO, and PPO plans (according to the number of subscribers). Questions examined eligibility, plan design, cost, and employer satisfaction.

Using a sample frame originally designed by the Health Care Financing Administration (HCFA) to adjust the accuracy of its national health care expenditure estimates, National Research Inc., a Maryland-based research firm, conducted telephone interviews with employee benefit managers from 771 firms in the spring of 1987. The sample frame includes an estimated 84 percent of Americans who receive health insurance through an employer. The sample frame included few employers that do not offer health insurance to their employees. Two major employer groups that provide health insurance to their employees are missing from our sample frame: Federal employees and workers who receive health insurance directly through a union. Another limitation of our data is that we did not gather information regarding the specific benefits offered in each plan. Therefore, the richness of the benefit plan is not a variable in our analysis.

Our response rate was 45 percent. With the exception of the BLS survey, this response rate exceeds that achieved in most surveys of employer-based health plans. Using the information in the sample frame collected by HCFA, we compared characteristics of responding and nonresponding employers. We found no differences between the two groups for all variables including industry, region, firm size, self-insurance status, and availability of an HMO plan.

We were able to compare the data from the HIAA survey of employers with those of the NMCES and the EHICS. The figures are comparable, with the exception that the 1977 NMCES included HMO's. In 1977, the private health insurance market was almost entirely conventional fee for service. Employees were predominantly covered by Blue Cross and Blue Shield plans and commercial insurance carrier plans. HMO's represented only 4.3 percent of the private health insurance market for persons under 65 years of age (Farley, 1985). PPO's did not emerge as a significant force until the early eighties (Gabel et al., 1986). In our analysis of the 1977 conventional market, it was not possible to segregate HMO enrollment. Because of the small share of the HMO business, however, its impact on the results should be minimal.

In this article, we have applied a series of weights to the survey findings to derive employee-based national estimates for the U.S. population that secures its health insurance through employers. Where appropriate in the tables, we have reported the number of firms in each category analyzed as well as the standard error associated with the given statistics. However, we could not determine the sample size or the standard errors for the 1977 NMCES data and could not compare these statistics with the 1987 data in Tables 1 and 2.

Conventional health insurance: 1977 versus 1987

Changes in eligibility and premium costs for 1987 and 1977 are given in Table 1. The number of employees eligible for employer-sponsored conventional health insurance has remained high in the past 10 years. Among firms that offered health benefits to their employees, 95 percent of the

Table 1

Employer and employee contributions in conventional plans, by region and selected variables: 1977 and 1987

Selected variable	United States	Region			
		Northeast	North Central	South	West
1977					
Percent of eligible employees	93	93	91	96	94
Total annual premium:					
In 1987 dollars[1]	$1,111	$1,192	$1,215	$943	$1,131
In 1977 dollars	609	653	666	517	620
Employer contribution:					
In 1987 dollars	$943	$1,053	$1,051	$741	$992
In 1977 dollars	517	577	576	406	544
Employee contribution:					
In 1987 dollars	$168	$139	$164	$202	$139
In 1977 dollars	92	76	90	111	76
Percent of premium contributed by employer	85	88	87	79	88
1987					
Percent of eligible employees	95	99	97	95	95
Total annual premium[2]	$1,656	$1,602	$1,698	$1,614	$1,794
Employer contribution	$1,374	$1,512	$1,524	$1,236	$1,404
Employee contribution	$282	$90	$174	$378	$390
Percent of premium contributed by employer	83	94	90	77	78

[1]Dollars are in constant 1987 dollars; adjustments made using the Consumer Price Index, all items.
[2]Total annual premium was calculated with a weighted adjustment for single and for family plans.

SOURCE: Health Insurance Association of America, 1987; National Center for Health Services Research, 1977.

employees were eligible for benefits in 1987. This compares with 93 percent of employees eligible for employee benefits in 1977. Eligibility increased in all regions except in the South, where it showed a slight decrease of less than 1 percent.

Premiums per eligible employee for conventional insurance in 1987 amounted to $1,656 nationwide and ranged from $1,602 in the Northeast to $1,794 in the West (Figure 1). Compared with the national average cost of $609 per eligible employee in 1977, premiums increased 171.9 percent during the last 10 years. This is an average annual increase of 10.5 percent. In constant 1987 dollars, premiums increased from $1,111 in 1977 to $1,656 in 1987. To illustrate how premiums have escalated, during this same period, general prices increased 82.4 percent (an average of 6.2 percent per year); and medical prices went up 120.8 percent (a rate of 8.3 percent per year). The difference between the rate of increase in medical care prices and insurance premiums largely reflects increases in the number of covered services, utilization, and intensity of services. Insurer administrative expenses and profits as a percent of premiums fluctuated greatly during the 10-year period but showed no clear upward movement and, thus, are not a major factor in explaining the difference in premium increases and medical care prices (Musco, 1988).

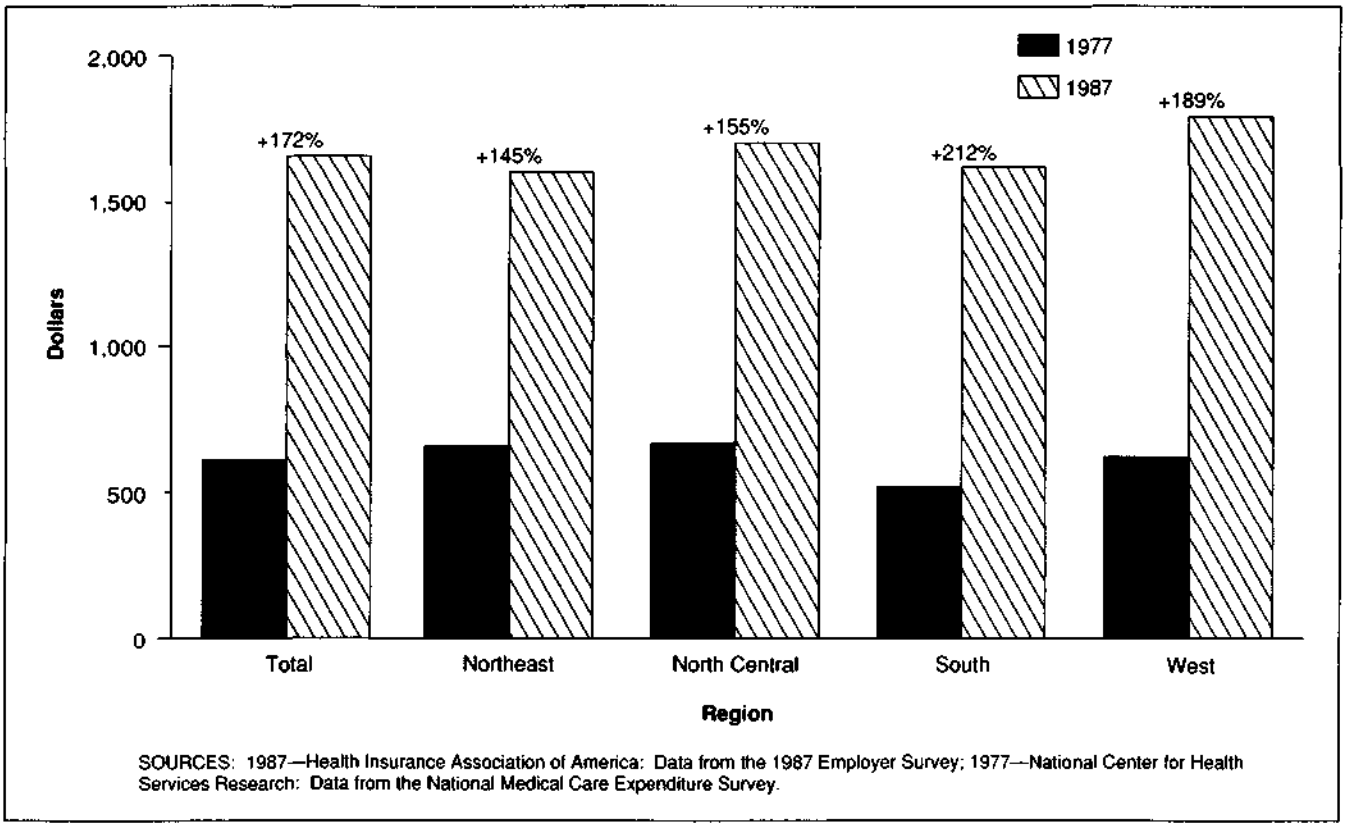
Employees who share in the cost of health insurance premiums have greater incentives for choosing cost-effective plans than employees who receive their health insurance free from their employers. Contrary to conventional wisdom, as a percent of the overall premium cost, employees are contributing only slightly more than they were 10 years ago. On the average, employers paid 83 percent of the premium in 1987 as compared with 85 percent in 1977 (Figure 2). In regional comparisons, however, our survey data show that employers are actually paying a greater percent of the premium in two of the four regions of the country. The greatest change occurred in the West Region, which showed a significant decrease in the proportion of premiums paid by employers, from 88 percent of premiums in 1977 to 78 percent in 1987.

Overall, employers in the Northeast continue to pay the largest portion of the premium cost. Those in the South pay the lowest portion, as was true a decade ago. During the 1977 NMCES, there was a strong correlation between the cost of the insurance and the percent the employer paid—the higher the proportion paid by the employer, the higher the overall premium cost. In 1987, this pattern was no longer true. In fact, the Northeast had the lowest conventional premium cost and the second highest employer contribution, and the West had the highest premium cost and the second lowest employer contribution of the four regions.

In terms of dollar outlays, employers paid the most money in the North Central Region, $1,524 per employee; and employers in the South contributed the least, $1,236 per employee annually. There was a decided contrast on the employee side, where employees paid $390 annually in the West, as

Figure 1

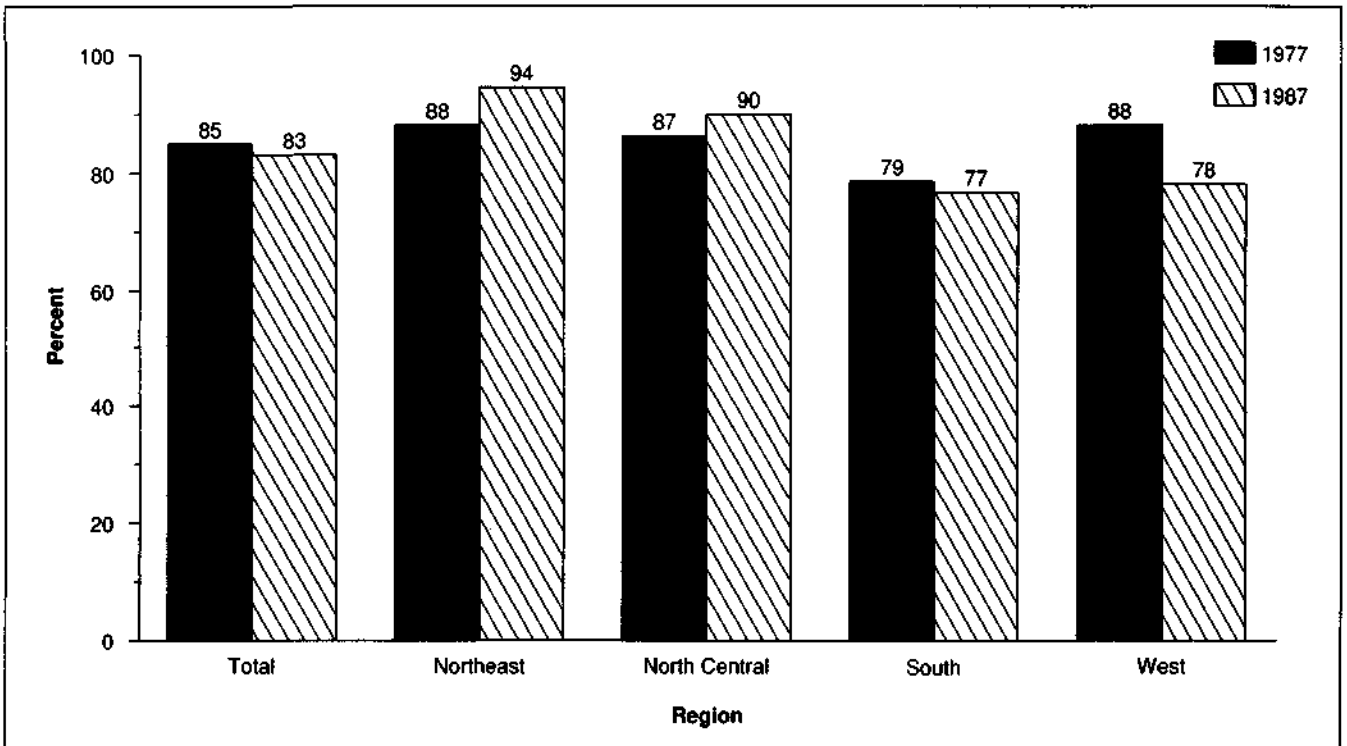
Premium increases for conventional plans, by region: 1977 and 1987



SOURCES: 1987—Health Insurance Association of America: Data from the 1987 Employer Survey; 1977—National Center for Health Services Research: Data from the National Medical Care Expenditure Survey.

Figure 2

Percent of conventional premium paid by employers, by region: 1977 and 1987



SOURCES: 1987—Health Insurance Association of America: Data from the 1987 Employer Survey; 1977—National Center for Health Services Research: Data from the National Medical Care Expenditure Survey.

compared with only $90 a year in the Northeast. Increases in the employer contribution did not vary significantly from the national average. However, growth in employee contributions varied widely from a low of 18 percent in the Northeast to a high of 413 percent in the West. In fact, after adjusting for general inflation, employees in the Northeast actually contributed less towards the premium than they did a decade ago.

We also collected data on the contribution levels for both employer-based individual and family coverage. Employers pay a greater share of the individual plan than they do of the family plan. Employers pay 95 percent of the individual premium, as compared with 77 percent of the family plan. In the Northeast and West, the employer paid 100 percent of the cost for the majority of the employees with individual coverage. For family coverage, the percent of total contributions picked up by the employer varied greatly by region, with employers in the Northeast Region paying the most—92 percent of the family cost for their employees. The West showed the lowest contribution by employers, who paid only 68 percent of the premium.

Changes in patient cost sharing between 1977 and 1987 are shown in Table 2 (Wilensky et al., 1984). Figures for deductibles and coinsurance are for physician services. Figures for lifetime maximum benefits and out-of-pocket maximums apply to all services. The number of employees with first-dollar coverage for physician services declined from 15 percent to 5 percent (Table 2). The number of workers having to pay less than 20 percent coinsurance has declined from 21 percent to 9 percent.

These increases in cost sharing, however, have been somewhat offset by a dramatic increase in the number of workers with catastrophic protection. In an era of high-tech medicine, catastrophic cases assumed increasing importance in cost-control efforts. For example, one study of 1.2 million insured persons found that individuals incurring more than $1,000 in claims accounted for nearly 90 percent of insurer payments (Medstat, 1988). In 1987, nearly 90 percent of employees have out-of-pocket maximums; only 46 percent had these in 1977. The number of workers with unlimited maximum benefits increased from 10 to 17 percent.

Table 2

Percent distribution of employment-related cost-sharing features: United States, 1977 and 1987

Feature	1977	1987
No deductible, less than 20 percent coinsurance	7.8	1.7
No deductible, 20 percent or more coinsurance	6.9	3.3
Deductible, less than 20 percent coinsurance	13.2	7.5
Deductible, 20 percent or more coinsurance	60.1	75.4
No coverage or don't know	12.0	12.1
Lifetime maximum benefits:		
Limited dollars	77.0	72.7
Unlimited dollars	10.1	17.2
No coverage or don't know	12.9	10.1
Out-of-pocket maximum:		
Limited liability	45.6	88.0
Unlimited liability	41.5	6.1
No coverage or don't know	12.9	5.9

SOURCE: Health Insurance Association of America, 1987; National Center for Health Services Research, 1977.

Comparing conventional plans by sponsor

One major change in the conventional insurance market during the past decade has been the decline of traditional insurers—Blue Cross and Blue Shield and commercial insurers—and the rise of third-party administrators and self-administered plans. The dramatic growth of self-insurance is largely responsible for this shift.

Traditionally, Blue Cross and Blue Shield and commercial insurer policies completely insured a plan's expenses and provided all administered duties—insurer and administrator were synonymous. This meant that insurers would calculate their risk to provide health insurance protection as well as the added expense of administrative duties and would charge a premium to cover this cost. The insurer was then responsible for all of the expenses that arose.

The growth of self-insurance, spurred by the passage of the Employee Retirement and Income Security Act in 1974, led to a debundling of the risk and administrative functions of insurers. By exempting self-insured plans from State regulation of health insurance, the act bestowed strong financial rewards to self-insured employers. Self-insured plans were not subject to State laws requiring health plans to provide specified benefits mandated by State legislation, such as chiropractic services. Self-insured plans also were not subject to State premium taxes. Self-insurance also allowed firms to pay claims as they were submitted, rather than paying an insurance premium each month. Thus, employers were able to earn interest on their working capital.

Because self-insured firms did not require the services of Blue Cross and Blue Shield and commercial insurance companies to insure financial risk, companies quickly came into the business under a generic term called "third-party administrators" (TPA's). These companies specialize in providing administrative services (i.e., paying claims, keeping track of eligibility) without the additional expenses that are incurred with underwriting costs. Several employers also felt their needs would be best served if they administered their own plan. Not to be outdone, the Blue Cross and Blue Shield and commercial carriers also marketed products that provided administrative services only or partial insurance protection plans called minimum premium or stop-loss plans. These latter plans allow employers to self-insure their plan up to a certain dollar amount (and gain the savings afforded by self-insuring a plan).

When this dollar figure is reached, the insurer pays the rest of the claims. Thus, these plans protect the employer from an unusual or catastrophic experience in any given year.

Hence, in 1977, commercial insurers held approximately 53 percent of the market, Blue Cross and Blue Shield retained 38 percent, and self-administered, TPA, and independent plans held 9 percent of the group market (Carroll and Arnett, 1979). One decade later, data from the 1987 HIAA survey show commercial insurance companies now administer 40 percent of the conventional insurance market, Blue Cross and Blue Shield plans administer 24 percent, and self-administered and TPA plans administer the remaining 36 percent (Figure 3). Blue Cross and Blue Shield sponsored plans have their greatest share of the market in the East Region of the United States, as they did a decade ago. Plans sponsored by commercial insurance companies are strongest in the East and North Central Regions, as was the case in 1977. The self-administered and TPA plans are strongest in the South and the West.

When employers provide health insurance for their employees, very often they give employees an opportunity to choose from more than one plan. For example, employers may offer two conventional plans—one administered by Blue Cross and Blue Shield and one administered by a commercial carrier—or they may make available one conventional plan and one or more HMO or PPO plans.

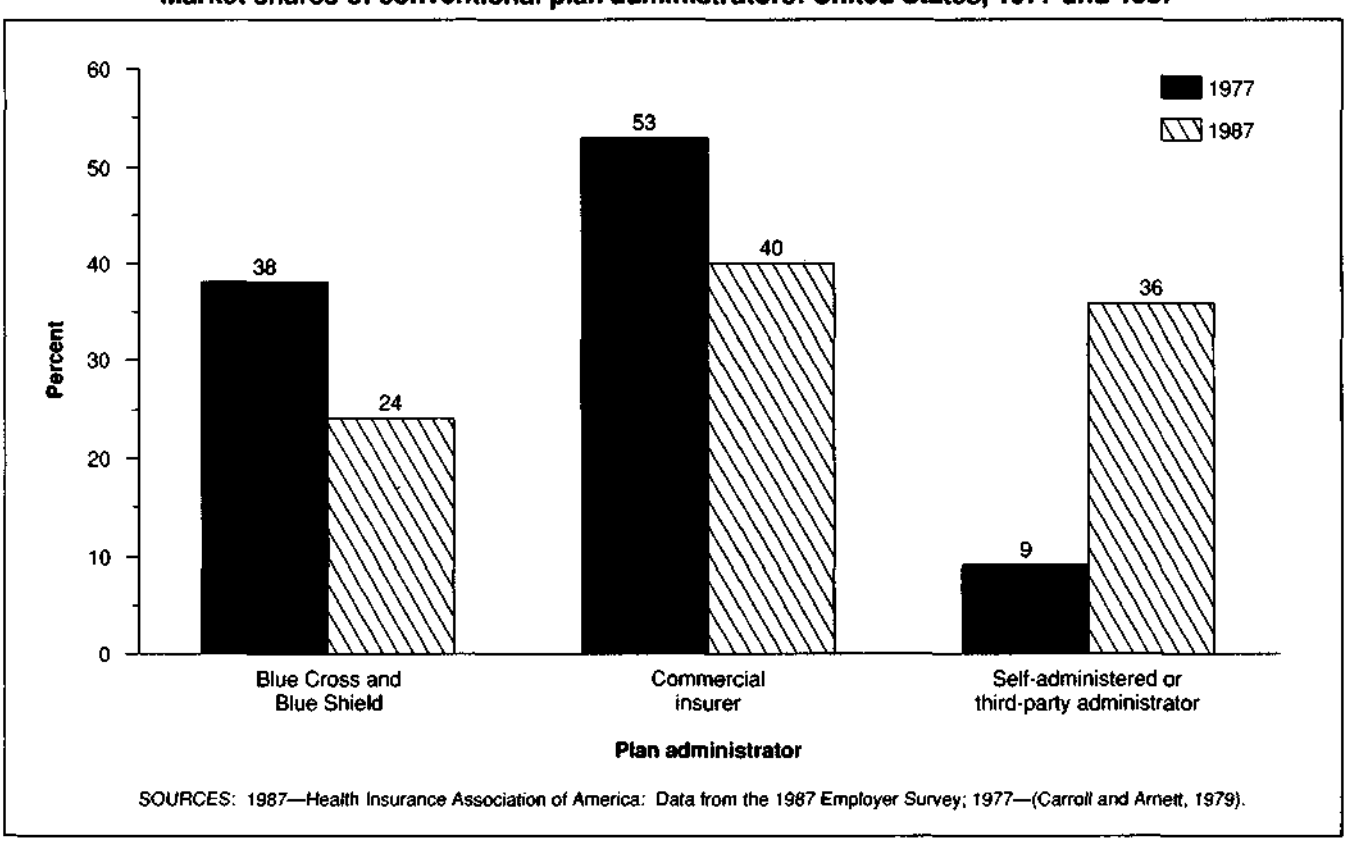
Firms that self-administered or had TPA-administered conventional plans faced more competition from HMO and PPO plans than the other administrators (Table 3). Seventy percent of these employers gave their employees the opportunity to choose an HMO, and 2 percent, the opportunity to join a PPO. Only 38 percent of the employees administered by Blue Cross and Blue Shield had the opportunity to choose an HMO, and 7 percent had the opportunity to select a PPO plan. Commercially administered plans were between these groups on both accounts. Regardless of their opportunities of choice, when an employer offered a conventional plan, an overwhelming majority of employees made it their choice (roughly 9 out of 10).

Self-insurance status varies greatly according to the plan administrator (Table 3). For the Blue Cross and Blue Shield and commercial insurers, fully insured business was the dominant mode of funding at 69 and 51 percent, respectively. A partly insured plan (presumably where an employer would be self-insuring a plan and have a stop-loss arrangement with an insurer) made up the next greatest portion of the Blue Cross and Blue Shield and commercial insurer business. Plans administered by employers and TPA's were predominantly self-insured (72 percent), with an additional 26 percent of these plans having a stop-loss arrangement.

Almost as striking as the growth of self-insurance during the decade has been the emergence of

Figure 3

Market shares of conventional plan administrators: United States, 1977 and 1987



SOURCES: 1987—Health Insurance Association of America: Data from the 1987 Employer Survey; 1977—(Carroll and Arnett, 1979).

Table 3

Conventional plan administrators, by selected variables: United States, 1987

Selected variable	Plan administrator		
	Blue Cross and Blue Shield	Commercial insurance companies	Other plans
Percent of market	24	40	36
Percent of employees choosing conventional plan when also given choice of HMO and/or PPO	91 (1.8)	91 (1.2)	90 (1.5)
Percent of employees in a conventional plan given choice of PPO	7 (8.8)	6 (6.7)	2 (4.8)
Percent of employees in a conventional plan given choice of HMO	38 (6.0)	40 (3.7)	70 (5.2)
Percent of employees in first year of plan contract with current insurer	11 (2.3)	18 (2.3)	7 (1.8)
Retiree per active employees	1-13 (2.0)	1-11 (1.9)	1-7 (2.9)
Percent of plans with specified insured status:			
Fully insured	69 (3.4)	51 (3.0)	2 (1.8)
Self-insured	11 (2.2)	8 (1.7)	72 (3.7)
Partly insured	19 (2.7)	38 (2.8)	26 (3.5)
Percent of plans with preadmission certification:			
Always required	24 (3.1)	37 (3.0)	37 (4.0)
Sometimes required	14 (2.4)	7 (1.8)	4 (2.2)
Never required	57 (3.7)	52 (3.1)	59 (4.1)
Percent of plans with second surgical opinion:			
Always required	23 (3.0)	55 (3.1)	39 (4.0)
Sometimes required	11 (2.2)	9 (1.8)	10 (2.5)
Never required	58 (3.7)	33 (2.9)	50 (4.1)

NOTES: Standard errors are in parentheses. Percents may not add to 100 because of "Don't know" responses. HMO is health maintenance organization; PPO is preferred provider organization.

SOURCE: Health Insurance Association of America, 1987.

prospective utilization review among conventional plans. Earlier studies have established that there was little prospective utilization review prior to 1984 (Gabel et al., 1987). Since then, it has grown at a rapid pace, with commercial insurers instituting more prospective review than Blue Cross and Blue Shield and the other plans. A mandatory second surgical opinion was always or sometimes required for 64 percent of the employees covered by commercial insurer plans. Blue Cross and Blue Shield had this provision for only 34 percent of the employees in plans administered by them, and self-administered and TPA plans had this provision for 49 percent of those covered (Figure 4). Preadmission certification was always or sometimes required for 44 percent of the commercial insurer covered employees, 38 percent of the Blue Cross and Blue Shield employees, and 41 percent of the self-administered and TPA employees (Figure 5).

Blue Cross and Blue Shield administered plans placed smaller cost-sharing burdens on employees than the commercials or self-administered and TPA plans (Table 4). An employee covered by Blue Cross and Blue Shield typically faced a modest $100 individual deductible and a low $200 family deductible. The self-administered and TPA plans had the highest deductibles ($150 for an individual and $400 for a family), and the commercial insurers had a $150 individual deductible and a $300 family deductible. Lifetime family maximums were the least generous under the Blue Cross and Blue Shield plans, where almost one-quarter of the employees had less than $1 million of coverage. However, lifetime maximums for the most part were very generous. Across all plans, the most common maximum out-of-pocket expenditure was between $501 and $1,000. The most common coinsurance rate was 80-20, where the employer paid 80 percent and the employee paid 20 percent.

Premium costs did not vary significantly among plan sponsors. Individual coverage costs ranged by only $6 dollars a month, from a high of $97 for commercial insurers to a low of $91 for self-administered and TPA plans (Table 4). Family coverage ranged from a high of $220 a month for commercial insurers to a low of $191 for self-administered and TPA plans.

Overall cost increases from 1986 to 1987 were very modest. Among the different plan sponsors, Blue Cross and Blue Shield had the greatest increase from 1986 of 7.4 percent. The commercial insurers had the lowest increase, with only a 5.7 percent increase in premiums. Employers are passing on a greater share of the premium cost to their employees in the commercially sponsored benefit plans. In these plans, employees saw a 7.8-percent increase in their premium contributions. Self-administered and TPA plans increased their employee contributions the lowest amount—only 1.1 percent from the previous year.

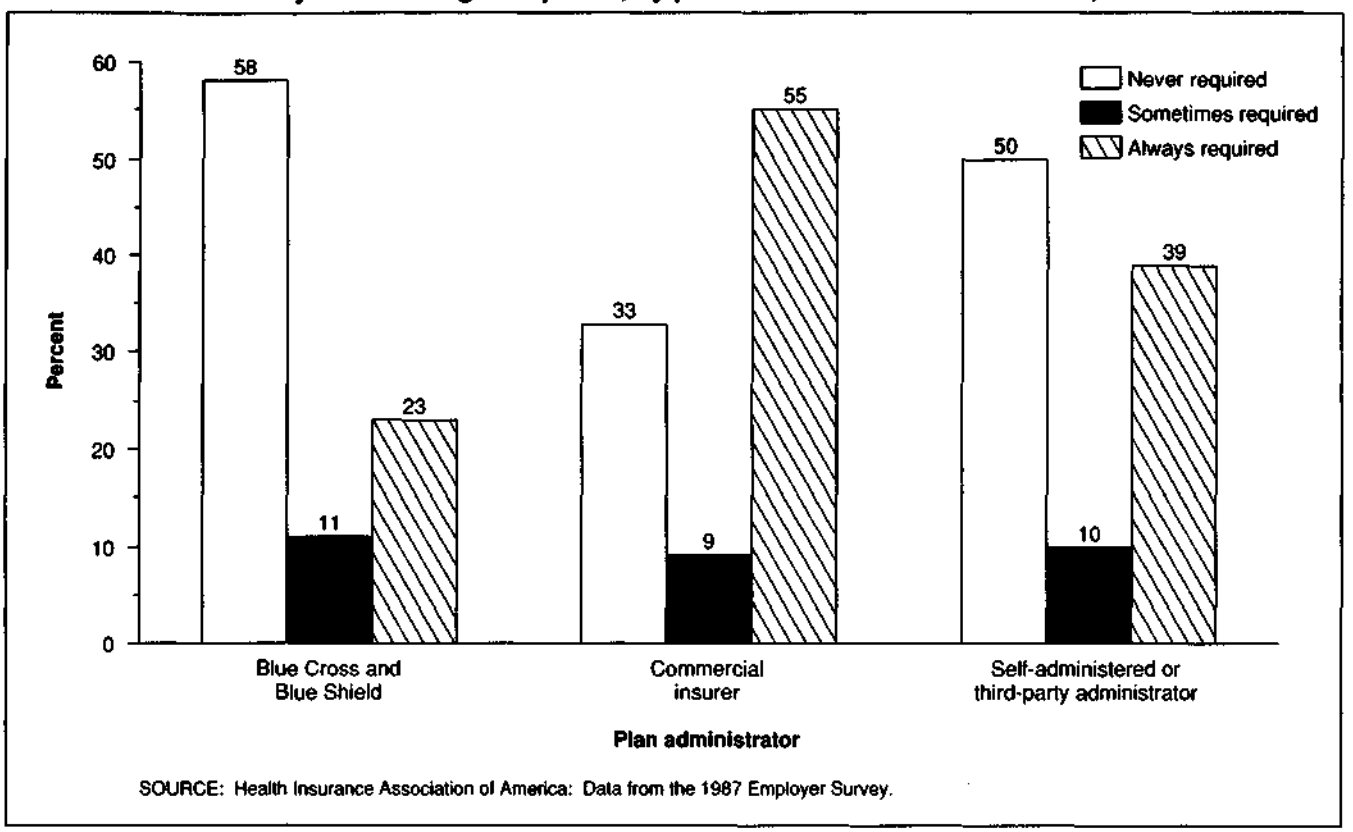
Comparing conventional plans by size

Conventional wisdom holds that small employers pay more for health insurance coverage than large or mid-sized employers and that the characteristics of their plans differ too. The HIAA survey of employers allows an examination of insurance coverage among small employers and a comparison with coverage of other employers.

Characteristics of conventional health plans of small employers (25 employees or fewer), small to medium employers (26 to 99 employees), medium to large employers (100 to 999 employees), and large employers (1,000 employees or more) are shown in Table 5. Three facets seem to distinguish small (1 to 25 workers) employers' conventional plans from the

Figure 4

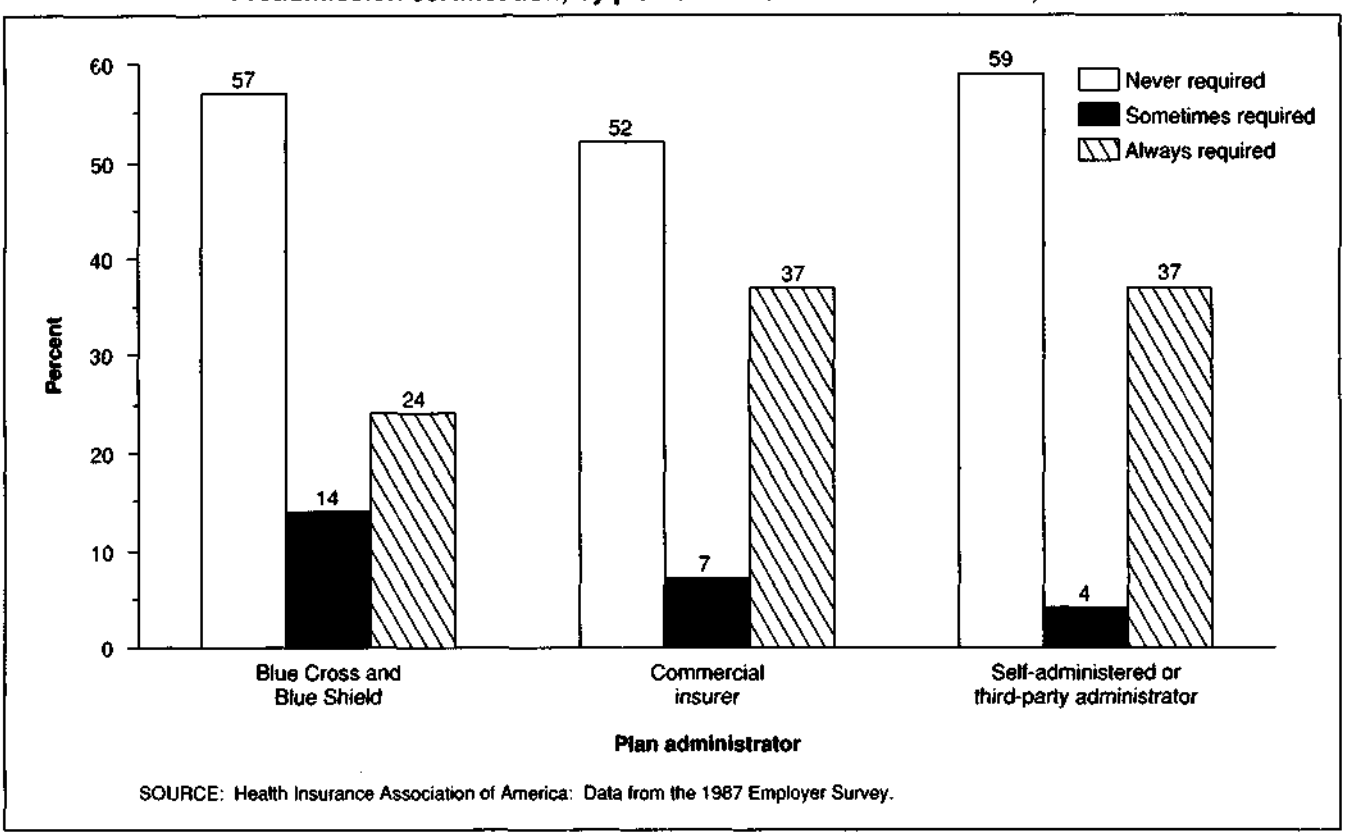
Mandatory second surgical opinion, by plan administrator: United States, 1987



SOURCE: Health Insurance Association of America: Data from the 1987 Employer Survey.

Figure 5

Preadmission certification, by plan administrator: United States, 1987



SOURCE: Health Insurance Association of America: Data from the 1987 Employer Survey.

Table 4

Cost sharing in conventional plans, by plan administrator and selected variables: United States, 1987

Selected variable	Plan administrator		
	Blue Cross and Blue Shield	Commercial insurance companies	Other plans
Premium cost:			
Individual coverage	$ 93	$ 97	$ 91
	(3.6)	(3.2)	(3.3)
Family coverage	203	220	191
	(6.0)	(4.5)	(5.7)
Percent of premium contributed by firm:			
Individual coverage	88.8	82.0	81.0
	(1.6)	(1.5)	(1.9)
Family coverage	75.9	78.2	76.2
	(4.9)	(4.5)	(5.7)
Percent change in employee contribution from previous year	+4.7	+7.8	+1.1
	(1.4)	(3.4)	(0.8)
Percent change in family premium from previous year	+7.4	+5.7	+6.4
	(1.1)	(0.8)	(0.8)
Plan deductible:			
Individual coverage	$100	$150	$150
	(12.5)	(5.6)	(6.8)
Family coverage	200	300	450
	(26.1)	(13.4)	(13.4)
Percent of plans with specified coinsurance rate:			
100-0	12	4	4
	(2.8)	(1.4)	(1.2)
90-10	9	4	1
	(1.9)	(1.4)	(0.8)
80-20	64	75	86
	(3.9)	(2.6)	(3.0)
70-30	2	1	1
	(1.1)	(0.6)	(0.8)
Other	13	16	8
	(2.8)	(2.2)	(2.2)
Percent of plans with specified maximum out-of-pocket expense:			
$500 or less	27	23	13
	(3.7)	(2.6)	(2.9)
$501-1,000	30	28	55
	(3.8)	(2.9)	(4.1)
$1,001-2,000	14	27	22
	(3.0)	(2.9)	(3.5)
$2,001 or more	6	10	6
	(1.7)	(2.0)	(2.3)
No limit	7	5	4
	(1.7)	(1.4)	(1.8)
Percent of plans with specified lifetime family maximum benefit:			
Less than $1,000,000	22	17	3
	(3.4)	(2.6)	(1.4)
$1,000,000 or more	46	43	74
	(4.0)	(3.2)	(3.7)
Unlimited	15	28	8
	(3.1)	(2.7)	(2.3)

NOTES: Standard errors are in parentheses. Percents may not add to 100 because of "Don't know" responses.

SOURCE: Health Insurance Association of America, 1987.

plans of other employers. First, employees within the small-employer sector rarely are free to choose between a conventional plan and an HMO or PPO. In no case did a conventional plan compete with a PPO plan, and in only 7 percent of the firms did it compete with an HMO plan. Second, nearly 90 percent of the conventional plans among small firms are fully insured plans. In contrast, more than 85 percent of the large firms self-insure in some capacity, either through an administrative-services only arrangement, or through a minimum-premium (stop-loss) plan. Third, insurers have moved more slowly to have small employers adopt prospective utilization review than they have with mid-sized and large employers. For example, nearly one-half of the large firms had a preadmission certification program,whereas only 29 percent of small firms did. Large employers tend to be better informed about the health insurance marketplace and, thus, are more likely to adopt innovations before small employers do.

Cost-sharing arrangements in conventional plans are compared according to the size of the employer in Table 6. Employees in small firms face a $100 individual deductible and a $300 family deductible, the same as their peers in mid-sized firms. The 80-20 coinsurance rate is the predominate method for conventional plans, regardless of the size of the employer. Small employers are more likely than either mid-sized or large firms to offer a coinsurance-free plan, however. Employees in small firms contribute a slightly lower percent of the health insurance premium for their conventional plan than their peers in large or mid-sized firms, particularly for individual coverage. More employees in small firms are without catastrophic out-of-pocket protection; nonetheless, when present, these thresholds tend to be lower than those in mid-sized and large firms.

To protect themselves against poor risks, many insurers individually underwrite employees in small firms. Because small firms must spread these costs and other administrative expenses across a smaller base and at greater risk because of the smaller base, conventional wisdom holds that these employers must pay substantially more for a given amount of financial protection. Some individuals have estimated that the difference in cost between small and large firms is 40 percent for similar policies (U.S. Senate, 1988).

Table 6 suggests that the differences between large and small employers in fact are modest. Single coverage costs approximately 10 percent more for small employers. Family coverage costs less, on the average, than for large and mid-sized employers. There are a number of serious limitations to these comparisons, however. Our analysis does not control for the richness of the benefit package nor for the geographic location of the employer. Presumably, small employers are disproportionately located in low-cost rural areas; in addition, large employers offer richer benefits (Farley, 1986). One other possible explanation is that insurers may screen many of the high-risk small groups as uninsurable.

Table 5

Number of conventional plans, by size of employer and selected variables: United States, 1987

Selected variable	Size of employer			
	Large (1,000+)	Medium-large (100-999)	Medium-small (26-99)	Small (1-25)
Percent of employees choosing conventional plan when also given choice of HMO and/or PPO	86	93	96	98
	(1.4)	(1.6)	(2.0)	(0.6)
Percent of employees in a conventional plan given choice of PPO	6	4	2	0
	(6.3)	(7.5)	(9.9)	(0.0)
Percent of employees in a conventional plan given choice of HMO	80	26	16	7
	(5.4)	(6.3)	(7.7)	(14.9)
Percent of employees in first year of plan	6	9	25	26
	(1.5)	(2.5)	(4.1)	(5.3)
Percent of plans with specified insured status:				
Fully insured	13	42	74	89
	(2.6)	(3.7)	(4.0)	(3.7)
Self-insured	56	21	5	3
	(3.4)	(3.0)	(2.1)	(1.7)
Partly insured	31	36	19	5
	(2.9)	(3.5)	(3.5)	(2.9)
Percent of plans with preadmission certification:				
Always required	43	30	24	19
	(3.3)	(3.4)	(4.1)	(3.8)
Sometimes required	4	10	13	10
	(1.6)	(2.2)	(3.1)	(3.7)
Never required	53	56	60	58
	(3.4)	(3.7)	(4.7)	(6.5)
Percent of plans with second surgical opinion:				
Always required	50	42	23	31
	(3.2)	(3.6)	(4.0)	(5.6)
Sometimes required	9	7	16	2
	(1.5)	(2.0)	(3.6)	(2.4)
Never required	41	45	54	63
	(3.0)	(3.7)	(4.8)	(5.7)

NOTES: Standard errors are in parentheses. Percents may not add to 100 because of "Don't know" responses. HMO is health maintenance organization; PPO is preferred provider organization.

SOURCE: Health Insurance Association of America, 1987.

In a year of modest increases in the price of health insurance (1986 to 1987), small employers experienced significantly smaller increases (2.6 percent) than did large and mid-sized firms. In fact, employers with 1,000 employees or more experienced the highest rate of change (up 6.9 percent). One possible contributing factor to this pattern of increases is adverse selection—where conventional plans attract a disproportionate share of the poor health risks. Many health analysts contend that individuals with closer ties to their doctors are less willing to join an HMO—and heavy users of health care are more likely to have close ties (Wilensky and Rossiter, 1986). HMO's and PPO's held approximately 15 percent of the market among large employers that offered conventional coverage and less than 2 percent among small employers.

Assessing conventional health plans

In 1977, conventional health plans reigned as the unchallenged monarch of the private health insurance world. In the following decade, insurance premiums increased at an average annual rate of 10.5 percent, almost double the rate of increase of the Consumer Price Index. As purchasers searched for ways to contain the rising cost of health care, the conventional plan's market share declined from 95 percent to 73 percent of the group insurance marketplace, with most of the decrease experienced in the latter part of the 10-year span.

As insurers of conventional plans fought to retain their market share, the conventional plan underwent significant change. Most obvious was the growth of self-insurance. There was little self-insurance in 1977. One decade later, nearly 60 percent of the Nation's employees with conventional coverage were enrolled in a plan with some aspect of self-insurance.

As self-insurance grew, employers took responsibilities formerly held by insurers, including the assumption of risk. New organizations entered the marketplace, and enrollment with the traditional insurers—Blue Cross and Blue Shield plans and commercial insurers—declined. In 1977, the traditional insurers held 95 percent of the market. One decade later, TPA's and self-administered plans had more than one-third of the market, surpassing Blue Cross and Blue Shield plans in market share.

Table 6

Cost sharing in conventional plans, by size of employer: United States, 1987

Selected variable	Size of employer			
	Large (1,000+)	Medium-large (100-999)	Medium-small (26-99)	Small (1-25)
Premium cost:				
Individual coverage	$ 94	$ 90	$ 98	$107
	(2.7)	(3.9)	(5.3)	(6.7)
Family coverage	205	191	210	189
	(4.3)	(5.0)	(10.1)	(7.2)
Percent of premium contributed by firm:				
Individual coverage	82.2	86.5	82.4	87.8
	(1.5)	(1.5)	(2.7)	(2.6)
Family coverage	80.0	72.3	73.3	78.8
	(4.1)	(5.1)	(8.8)	(6.6)
Percent change in employee contribution from previous year	+1.8	+2.9	+12.0	-1.0
	(1.4)	(1.0)	(7.8)	(1.6)
Percent change in family premium from previous year	+6.9	+6.7	+5.4	+2.6
	(0.7)	(1.0)	(1.4)	(1.3)
Plan deductible:				
Individual coverage	$150	$100	$100	$100
	(5.3)	(7.8)	(17.3)	(12.5)
Family coverage	400	300	300	300
	(11.7)	(21.0)	(30.1)	(31.5)
Percent of plans with specified coinsurance rate:				
100-0	3	9	7	15
	(1.3)	(2.4)	(2.6)	(4.9)
90-10	3	6	3	0
	(1.3)	(1.7)	(1.6)	(0.0)
80-20	85	66	73	73
	(2.6)	(3.7)	(4.1)	(6.1)
70-30	0	0	4	0
	(0.0)	(0.0)	(1.8)	(0.0)
Other	8	9	14	1
	(1.8)	(1.7)	(2.8)	(1.3)
Percent of plans with specified maximum out-of-pocket expense:				
$500 or less	15	19	29	28
	(2.4)	(3.0)	(4.5)	(6.0)
$501-$1,000	46	37	30	16
	(3.1)	(3.6)	(4.7)	(5.1)
$1,001-$2,000	27	14	16	23
	(2.9)	(2.6)	(3.4)	(5.7)
$2,001 or more	6	14	5	13
	(1.7)	(2.6)	(2.4)	(4.5)
No limit	5	9	5	13
	(1.5)	(1.9)	(2.4)	(4.5)
Percent of plans with specified lifetime family maximum benefit:				
Less than $1,000,000	16	25	12	8
	(2.6)	(3.2)	(3.6)	(3.8)
$1,000,000 or more	63	45	52	37
	(3.1)	(4.0)	(5.4)	(6.9)
Unlimited	16	19	17	26
	(2.6)	(3.2)	(3.7)	(6.2)

NOTES: Standard errors are in parentheses. Percents may not add to 100 because of "Don't know" responses.

SOURCE: Health Insurance Association of America, 1987.

Prospective utilization review illustrates another dramatic development affecting conventional plans. A majority of employees in 1987 were covered by a mandatory surgical second opinion program, and 45 percent were covered by preadmission certification review. As recently as 1984, only about 5 percent of conventional plans had preadmission review programs. Utilization review should continue this growth, particularly among small employers, in the immediate future.

Meeting the challenge of rising health care costs requires sacrifice, and one of the most unpleasant of these sacrifices is patient cost sharing. Yet, as long as it costs employees very little each time they seek care, there will be little reward for employees for choosing cost-effective health plans and for seeking efficient

care. One surprising finding from the 1987 HIAA survey was that, after adjusting for inflation, employees today bear only modestly increased cost-sharing burdens over those of a decade ago. Employers pay for 83 percent of the cost of health insurance, down from 85 percent in 1977. For physician services, there was a modest decline in first-dollar coverage, and fewer workers today face coinsurance rates of less than 20 percent. These increases in cost sharing, however, were somewhat offset by a dramatic increase in the number of workers with limits on out-of-pocket costs.

What does the HIAA survey suggest about the future of conventional insurance? With the rapid growth of HMO's and PPO's in this decade, many health experts are predicting a quick demise for the conventional insurance market. Our survey suggests that this dire forecast may be a bit premature. Conventional plans are still the largest form of private health insurance coverage in this country. When employees have their choice of plans, they still choose the conventional plans in large numbers; meanwhile, employers express high levels of overall satisfaction with these plans.

There are, to be sure, some forces working against coventional plans. For example, it appears that Medicare will continue to tighten its prospective payments to hospitals during the next few years. As Medicare payments fail to increase as rapidly as hospital expenses, hospitals are likely to attempt to recoup their lost revenues from insurers who reimburse on the basis of billed charges. HMO's and PPO's that negotiate prices with hospitals are in a stronger position to fend off so-called "hospital cost-shifting" than conventional plans (Frech and Ginsburg, 1988). Thus, a major weakness of conventional insurance is its inability to negotiate prices with hospitals and doctors, unlike their competitors, the HMO's and PPO's.

A major strength of conventional plans is their flexibility. This has allowed conventional plans to look increasingly similar to PPO and HMO plans with prospective-utilization review, without relinquishing patients' freedom to choose their doctors and hospitals.

Ultimately, the conventional market's fate will be determined by its ability to control costs. Cost control, after all, is the reason for the existence of HMO's and PPO's in the first place. In a year of modest premium increases, 1986 to 1987, conventional plans fared well. With future premium increases expected in the 20-percent range, the ability of conventional plans to compete with alternative delivery systems shall be revealed in the not-too-distant future.

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