

Chapter 4



Trends in Healthcare Costs

The increasing cost of health insurance premiums is the number one driver of the increase in the uninsured.

The increase in the percent of the population that is uninsured in both North Carolina¹ and across the nation² is driven by the increasing costs of health insurance premiums. Nationally, health insurance premiums increased 65% between 2000 and 2004. This rise was more than six times greater than general inflation (9.7%), and more than five times the wage growth (12.2%).³ The increase in premiums makes it harder for employers to offer insurance to employees and for individuals to purchase healthcare coverage. Research indicates that for every 10% increase in health insurance premiums the number of firms that offer health insurance to their employees falls by roughly 2.5%.⁴ As one employer noted in focus groups conducted in North Carolina in 2005, *“I want to provide it [health insurance], but I just can’t because the profit margin isn’t there to allow it to happen.”*

Health insurance premiums are comprised of many factors, the largest of which are the medical costs covered by the plan. Most of the increase in health insurance premiums is due to the increase in the underlying costs of healthcare.^{a,5,6,7,8} Healthcare costs increase for a variety of reasons, some are due to increased costs or utilization of services, and others are attributable to changes in overall disease prevalence. Each year, these factors affect overall healthcare costs in North Carolina and the rest of the country. This chapter examines trends in personal healthcare spending in North Carolina between 1990 and 2000, changes in unit costs and utilization of different services, and the effects of changes in disease prevalence and demographic changes on healthcare spending. Finally, the chapter discusses how these changes impact health insurance premiums and how employers and individuals respond to rising premium costs.

Total Personal Healthcare Spending in North Carolina (1990-2000)

Data from the Office of the Actuary of the Centers for Medicare and Medicaid Services show that North Carolinians spent \$31.3 billion dollars on personal healthcare expenses in 2000.⁹ Table 4.1 shows how the dollars were spent, and the increases in expenditures by service type between 1990 and 2000 (the most recent data available).

a The health insurance underwriting cycle can also have an effect on private health insurance premiums. (See page 64 for more information).



Table 4.1
Personal Healthcare Expenditures (North Carolina, 1990, 2000)

| | 1990 | 1990 % of total | 2000 | 2000 % of total | Percent increase 1990-2000 |
|--|-----------------|-----------------------|-----------------|-----------------------|----------------------------------|
| Hospital Care | \$5,905 | 42.8% | \$12,060 | 38.6% | 104.2% |
| Physician and Other Professional Services | \$3,748 | 27.2% | \$8,025 | 25.7% | 114.1% |
| Dental Services | \$662 | 4.8% | \$1,508 | 4.8% | 127.8% |
| Home Healthcare | \$288 | 2.1% | \$1,150 | 3.7% | 299.3% |
| Prescription Drugs | \$1,110 | 8.0% | \$3,882 | 12.4% | 249.7% |
| Other Nondurable Medical Products (e.g., diabetes test strips) | \$546 | 4.0% | \$679 | 2.2% | 24.4% |
| Durable Medical Products (e.g., wheelchairs or walkers) | \$215 | 1.6% | \$477 | 1.5% | 121.9% |
| Nursing Home Care | \$1,115 | 8.1% | \$2,524 | 8.1% | 126.4% |
| Other Personal Healthcare | \$208 | 1.5% | \$979 | 3.1% | 370.7% |
| Total | \$13,797 | 100.0% | \$31,284 | 100.0% | 126.7% |

Source: Centers for Medicare & Medicaid Services, Office of the Actuary, National Health Statistics Group. North Carolina Personal Health Care Expenditures (PHCE), All Payers 1980-2000.

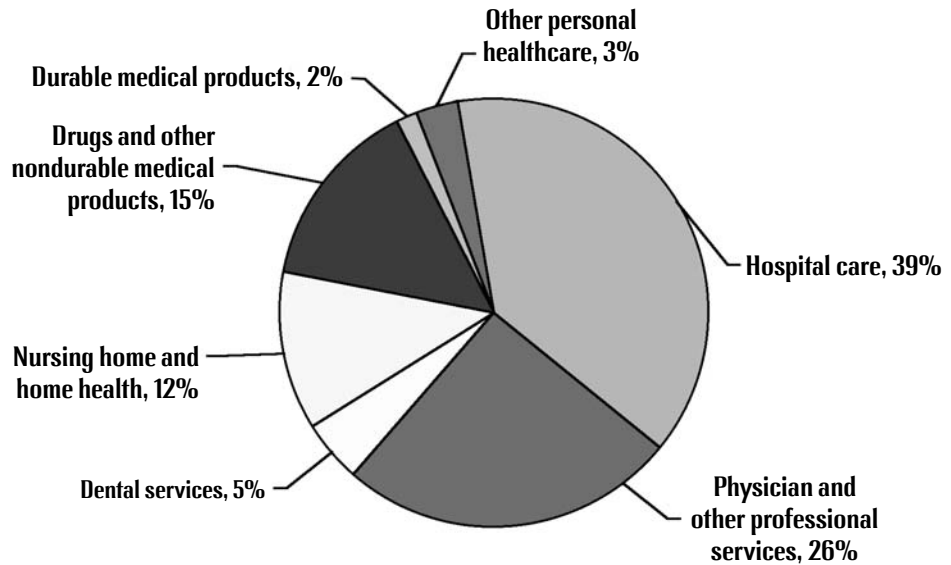
In 2000, more than one third of personal health spending in North Carolina was spent on hospital care (39%) and approximately one quarter (26%) on physicians and other professional services.⁹ These expenditure rates are similar to those at the national level (36% and 29%, respectively) and accounted for more than half of the increase in total expenditures from 1990-2000. Hospital care accounted for 35% of the increase in spending, while physician and other professional services accounted for 25%. However, in recent years, prescription drugs have been one of the fastest growing components of healthcare spending. Prescription drugs accounted for 16% of the increase in overall healthcare spending between 1990 and 2000. As a result, prescription drugs constituted 12% of North Carolina personal healthcare expenditures in 2000, compared to 8% in 1990.^b Long-term care (home health and nursing care) also constituted 12% of North Carolina personal healthcare expenditures in 2000, with spending on home healthcare increasing more than 300% since 1990.^c

^b Prescription drugs, by themselves, constituted 12.4% of personal healthcare expenditures in North Carolina in 2000, non-durable medical products accounted for another 2.2% of the state's personal healthcare expenditures. Centers for Medicare & Medicaid Services, Office of the Actuary, National Health Statistics Group. United States and North Carolina Personal Health Care Expenditures (PHCE), All Payers 1980-2000.

^c Long-term care expenditures, unlike most other healthcare expenses, is highly dependent on the payer. Public insurance programs, such as Medicare and Medicaid, account for a substantial portion of total spending on long-term care.



Chart 4.1
North Carolina Personal Health Expenditures (North Carolina, 2000)



Source: Centers for Medicare & Medicaid Services, Office of the Actuary, National Health Statistics Group. North Carolina Personal Health Care Expenditures (PHCE), All Payers 1980-2000.

Changes in Unit Cost and Utilization of Different Services

Expenditures for healthcare services are a function of two components: price per unit of service, and the number of units (amount of services received). Understanding whether the price or use of a service is increasing, or both, can help policymakers determine how to reduce healthcare costs. As described in more detail below, an increase in unit costs explains the rising costs of hospital inpatient care, while increased utilization explains the rising costs of hospital outpatient services and technology (particularly imaging). For prescription drugs, there has been both an increase in utilization and unit costs.¹⁰

Previous efforts to curb rising costs of care have focused primarily on price because it is easier to address than utilization. Providers contribute to increased utilization, as changes in technology or treatment protocols lead to increased use of certain services or procedures. Defensive medicine—or ordering unnecessary tests or procedures to prevent a potential malpractice claim—also increases utilization. Consumers' demand for services and medications also contributes to rising healthcare utilization. Controlling utilization is generally more difficult than trying to control costs because the public often views controls as restrictions on needed healthcare.¹¹ However, recent strategies have designed consumer cost sharing to influence patient utilization rates. By placing more financial responsibility on consumers, patients may reduce their use of unnecessary healthcare services.¹²



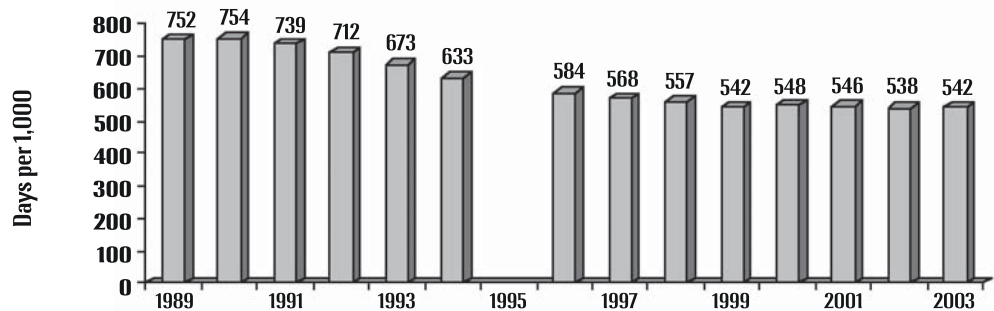
Hospital Care

Between 1990 and 2000, hospital spending increased 104% in North Carolina (see Table 4.1) and accounted for 35% of total growth in personal healthcare expenditures. Hospital spending includes that spent on both inpatient and outpatient services. National data from 2004 showed that hospital inpatient spending increased 6.2%, while hospital outpatient spending increased 11.3%.¹³

The increase in hospital services is due primarily to an increase in unit price, rather than an increase in utilization. Nationally, hospital utilization increased only 2.9% in 2004, but hospital unit cost for inpatient and outpatient services combined increased 7%.¹³ On a population basis, North Carolinians are spending less time admitted as inpatients than a decade ago (see Chart 4.2). In 1989, North Carolina residents' utilization of inpatient hospital services was 752 days per 1,000 persons, compared to only 542 days per 1,000 in 2003.¹⁴ Chart 4.2 demonstrates that most of the reductions occurred by the mid 1990s; utilization has essentially leveled off in recent years.¹⁵ The most dramatic decline in utilization occurred among the elderly.

By contrast, the cost per day spent in the hospital or per admission is escalating because there are more services, treatments, and procedures provided to patients once they enter the hospital. In addition, as more nonemergent healthcare needs can be treated on an outpatient basis, inpatient utilization for those services decreases and the more intensive, higher-cost services account for a greater proportion of inpatient services, which raises costs. Further, hospital labor costs for nursing and other health professionals have increased.^{16,17}

Chart 4.2
Hospital Days Per 1,000 People (North Carolina, 1989-2003)*



Sources: Admission data from Solucient, FY 1996-2003; Medical Database Commission, FY 1989-1994.

* No hospital data are available for 1995. Total admission to psychiatric, rehabilitation and substance abuse facilities (and beds) have been removed. Normal newborn admissions (DRG 391) have also been removed.

Costs for hospital outpatient care are also increasing, as the result of both higher utilization and greater unit price.¹³ This increase is a reflection of more services and procedures, such as biopsies, surgeries, and chemotherapy, that are safe and

^d It is important to note that the time period during which inpatient costs increased so significantly coincides with a decline in managed care. In the past, studies show that managed care was successful in suppressing spending on inpatient hospital care; particularly in lowering admissions rates and length of stay.



acceptable to be performed on an outpatient basis. In the past, some of these services would have been performed on an inpatient basis. Thus, while outpatient costs have been increasing, some of this increase in utilization helped offset the use of more expensive inpatient services. However, there is not a direct one-for-one correlation between increased use of outpatient services and decreases in inpatient utilization. Further, unit costs for outpatient care are not as well controlled as costs for inpatient care, where the use of diagnosis related groups (DRGs) or similar prospective payment methods limit charges per admission.^e

Are New Imaging Technologies Cost Effective?

While new technology and innovation is adding to healthcare costs it is critical to understand if these additions are cost effective. Determining the cost effectiveness of medical innovations is a challenging research task that few studies have undertaken. Cutler and McClellan studied the effectiveness of new treatment regimens for five conditions: heart attacks, low-birth weight infants, depression, cataracts, and breast cancer. New and improved treatment practices, involving technology and new procedures, have evolved for these conditions in the past several decades. Cutler and McClellan's research focused on determining if these new advances proved to be cost effective. Assumptions were made on the value of survival per year, and costs of treatment were subtracted out. The results showed that new treatments for heart attacks, low-birth weight infants, depression, and cataracts were cost effective. With respect to breast cancer, however, studies showed conflicting evidence on cost effectiveness of new treatments. This type of research, while challenging to conduct, is important to drive treatment and policy decisions in a very expensive healthcare system.¹⁹

Technology

Greater availability and use of technology are also significant healthcare cost drivers.¹⁸ Imaging has been one of the most significant technological advances in medical care. X-rays, introduced in 1895, were the first form of imaging. Newer forms of imaging, emerging in the late 20th century, include computed tomography (CT), magnetic resonance imaging (MRI), and positron emission tomography (PET). The current (2004) cost of a CT scan is over \$1,200, an MRI is generally just under \$2,000, and a PET scan costs approximately \$2,300.¹⁰

The availability of freestanding MRI and CT scans is associated with higher utilization and spending on these services.¹⁸ However, the use of these imaging technologies for diagnosis has generally proven to be additive rather than substitutive. A clinician may first order an x-ray or CT scan, and then order another imaging technology, such as an MRI, to confirm or further investigate a suspected malady.¹⁸ Therefore, while a diagnosis may be more accurate, the costs associated with determining that diagnosis are increasing.¹⁹ The latest imaging technology, PET, uses radioactive substances to examine body functions, and it is increasingly used to screen for cancer and heart disease despite professional disagreement over some specific uses of this scanning technique. Between 1970 and 1985, North Carolina had only three PET scanners in the state, located at the largest hospitals. However, since 1985, 16 more PET scanners have been approved, and now all teaching hospitals have at least one PET scanner. Moderate size hospitals are also applying for their use. This pattern of diffusion is typical for a new technology and will result in rising costs because of the wider availability of the scanners.

^e Diagnostic related groups (DRGs) is a hospital payment system used by Medicare and many third-party insurers. It prospectively sets the hospital payment based on the patient's primary and secondary diagnosis, surgical procedures, age, sex, and the presence of complications.



Prescription Drugs

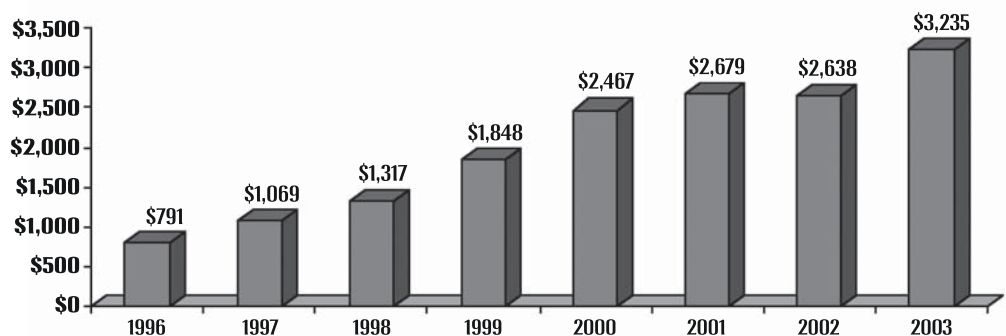
The rising cost of prescription drugs is also a major contributor to increasing healthcare costs. In North Carolina, expenditures for prescription drugs increased 250% between 1990 and 2000 (see Table 4.1). More recent national data show that prescription drug expenditures increased 47% between 2000 and 2003.²⁰ Both public and private insurance programs have experienced double digit annual increases in prescription expenses.²¹ This increase is due both to rising cost per prescription and an increased number of prescriptions filled.¹³

The rising costs of medications may be explained, at least in part, by the introduction of new medications into the market. The National Institute for Health Care Management (NIHCM) conducted a study of 1,035 new drug applications to the Federal Drug Administration between 1989 and 2000 and found that only 35% contained new active ingredients, while the remainder contained active ingredients already available on the market.²² Furthermore, only 24% of the drugs offered clinical improvement. Of all the new drug applications, only 15% were both highly innovative and offered significant clinical improvement. In addition, of the \$67.4 billion increase in spending on prescription drugs between 1995 and 2000, only 33% of the expenditures were spent on the pharmaceuticals that offered clinical improvements over existing prescription drugs. This raises questions about the cost effectiveness of the increased spending on pharmaceuticals.

A significant factor in the high utilization of new prescription drugs is direct-to-consumer (DTC) advertising (see Chart 4.3).²³ DTC advertising is a successful marketing tool; drugs that are heavily advertised experience a significant increase in their use.²⁴ Yet, there are a number of concerns about such advertising techniques. Advertisements generally contain limited information concerning side effects and promote expensive brand name drugs over generics. Patients who see these ads may exert pressure on their physicians to prescribe drugs they have seen advertised, and this may lead to use of higher cost drugs, rather than generic versions, and, in some cases, could lead to inappropriate clinical use.

Chart 4.3

Direct-to-Consumer Advertising (DTC) Spending, in Millions (United States, 1996-2003)



Source: IMS Health, Total US Promotional Spend by Type. 2004.



Malpractice

Rising malpractice premiums have been noted as a problem for some physicians in particular specialties and geographic areas. It may also negatively affect patients living in areas where physicians are no longer practicing as a result of high premiums. Malpractice also contributes to rising healthcare costs because it leads to defensive medicine. Physicians may order unnecessary tests or procedures, or avoid some high-risk patients out of fear of potential malpractice liability.²⁵ It is difficult to fully quantify the costs of defensive medicine, but several recent studies suggest that malpractice costs are not one of the primary contributors to the rising costs of healthcare. One study reported that only 7% of the annual increase in healthcare costs can be attributed to litigation and risk management,²⁶ while another showed that malpractice costs account for a very small proportion of healthcare premium costs.²⁷

Changes in Disease Prevalence and North Carolina Demographics

Changes in the prevalence of certain health problems underlie some of the increased use of health services. Trends in national healthcare spending are linked to the treatment of certain health conditions. Almost one third of the change in healthcare spending between 1987 and 2000 was attributable to the treatment of five major health problems: heart disease, mental disorders, pulmonary disorders, cancer, and trauma.²⁸ Approximately half of the increase in health spending was attributable to 15 conditions. Increases in the overall population, costs per treated case, and treated prevalence contribute to the increase in spending (see Table 4.2).

The increase in treated prevalence was the primary factor underlying increased spending on cerebrovascular disease (60%), mental disorders (59%), pulmonary conditions (42%), and diabetes (50%).¹ In contrast, the increased cost per treated case was the primary factor underlying greater spending on trauma (169%), pneumonia (94%), infectious diseases (95%), and heart disease (69%). Overall population growth generally accounted for 20–30% of the changes in healthcare spending for any specific condition.

Certain lifestyle choices and lifestyle-related illnesses contribute to these healthcare problems. Smoking, heavy drinking, and obesity⁹ can lead to chronic health problems and, as a result, increased healthcare costs.²⁹ The growing epidemic of obesity is a major contributor to the rising healthcare costs. Obese people have a higher risk of developing certain health problems, such as diabetes, hypertension, and heart disease. According to 2001 figures, 24% of the US population is obese, an increase of ten percentage points since 1987.³⁰ The increased prevalence in obesity alone accounted for 12% of the real per capita spending growth between 1987 and 2001. Sturm analyzed self-reported health risk data from a national household survey, and compared this to reported inpatient, outpatient, and prescription drug utilization. He found that obesity increased healthcare and medication costs by 36% and 77%, respectively, compared to someone with a normal weight.



Table 4.2
Change in Nominal Healthcare Spending for the Fifteen Most Costly Medical Conditions
(United States, 1987-2000)

| Condition | Total change in spending (millions) | Percent change in spending attributable to | | |
|-------------------------|-------------------------------------|--|----------------------------|----------------------|
| | | Increased cost per treated case | Rise in treated prevalence | Increased population |
| Heart disease | \$26,228.50 | 68.6% | 1.1% | 30.3% |
| Pulmonary disorders | \$24,792.00 | 37.5% | 41.9% | 20.6% |
| Mental disorders | \$24,503.30 | 21.1% | 59.2% | 19.7% |
| Cancer | \$17,734.30 | 41.9% | 27.4% | 30.7% |
| Hypertension | \$15,385.80 | 59.8% | 18.9% | 21.3% |
| Trauma | \$14,596.60 | 169.1% | -108.5% | 39.5% |
| Cerebrovascular disease | \$11,078.90 | 20.8% | 60.3% | 18.9% |
| Arthritis | \$10,282.80 | 44.3% | 31.6% | 24.1% |
| Diabetes | \$9,626.80 | 23.6% | 49.8% | 26.6% |
| Back problems | \$9,486.40 | 21.7% | 52.6% | 25.8% |
| Skin disorders | \$7,286.50 | 54.8% | 22.0% | 23.2% |
| Pneumonia | \$7,203.80 | 93.8% | -18.4% | 24.6% |
| Infectious disease | \$6,191.60 | 95.2% | -17.5% | 22.3% |
| Endocrine | \$5,029.10 | 28.0% | 43.4% | 28.6% |
| Kidney | \$3,231.40 | 8.8% | 55.8% | 35.4% |

Source: Thorpe KE, Florence CS, and Joski P. Which Medical Conditions Account for the Rise in Health Care Spending? Health Affairs. Web Exclusive. August 25, 2004;W-4-437-445. Exhibit 3.

Obesity has a much greater effect on the prevalence of chronic conditions than current or past smoking and problem drinking. However, current or past smoking also increased healthcare service costs 21% and medication costs 28-30%, depending on whether the individual was a current or past smoker. Compared to obesity, which increased absolute inpatient and ambulatory care costs by \$395 per year, current or ever smoking was associated with a \$230 increase, and problem drinking was associated with a \$150 increase.²⁹

Task Force members thought that one of the best strategies to reduce overall healthcare costs was to encourage people to live healthier lifestyles. The incidence of chronic diseases, and ultimately, healthcare spending could be decreased significantly if people would stop smoking, exercise regularly, maintain a healthy weight, and reduce other risky behaviors. While this may not yield immediate savings, it will help reduce healthcare costs over a longer period of time.

f Depending on the condition, the increase in treated prevalence can be due to an increase in epidemiological prevalence of the condition (e.g., diabetes) or to the rate of treatment for a particular condition (e.g., mental health).

g In July of 2004, the US Department of Health and Human Services announced its Medicare coverage policy would treat obesity as an illness. Obesity is defined as having a body mass index (BMI, calculated as weight in kilograms divided by height in meters squared) that is 30 or more.



People have a personal responsibility to be better stewards of their own health, but society at large can assist in that effort. Thus, the Task Force recommends:

Recommendation 4.1:

- a) Individuals have a responsibility to understand their health needs and risks and to be better stewards of their own health. To promote healthy lifestyles:
 - i) Individuals should be given the education, support, and resources needed to make informed healthy lifestyle choices, and they should use these resources to make healthy choices.
 - ii) Individuals with chronic diseases should be provided information and access to health services in order to manage their health conditions in a manner consistent with best known evidence-based care.
 - iii) Individuals who engage in risky health behaviors (such as smoking, sedentary lifestyles, or abuse of drugs or alcohol) should be expected to pay differential premiums to cover some of the increased healthcare costs of their unhealthy lifestyle choices.
- b) Providers, employers, insurers, schools, and government should work together to promote healthy lifestyle choices and encourage people to participate in evidence-based wellness initiatives.
 - i) Insurers should develop insurance products with financial incentives that reward healthy lifestyle behaviors and should cover wellness-related services (such as smoking cessation) as a basic benefit.
 - ii) Providers should educate individual patients and, where appropriate, their family members, about the importance of lifestyle choices in maintaining optimal health; provide information and referrals to help patients engage in healthy behaviors; and provide patients with the information and skills needed to manage chronic disease conditions.
 - iii) Employers should, to the extent possible, establish policies and environments that support positive behaviors (i.e., access to healthy food in vending machines and cafeterias, ensuring a tobacco-free environment, encouraging activity at work) and offer wellness programs to engage employees in health awareness and improvement programs in the workplace.
 - iv) Schools should also establish healthful policies and environments, including healthy food in cafeterias; opportunities for all youth to be active daily at school; tobacco-free policies; and educational opportunities to teach students the importance of healthy lifestyles to maintain optimal health.
 - v) Public health should continue and expand community-wide health awareness, promotion, nutritional information, and disease prevention activities.
 - vi) Communities and governments should help support healthy communities by providing environments conducive to healthy lifestyle choices (including, but not limited to, walkways, bicycle paths, safe parks, and green spaces).
- c) The NC General Assembly should adequately fund the public health system and infrastructure to provide community education and outreach related to lifestyle choices as well as health promotion and disease prevention, in accordance with the recommendations reported in the Public Health Improvement Plan developed by the NC Public Health Task Force (2004).



Population demographics can also affect healthcare spending. For example, adults over the age of 65 years spend more per capita on healthcare than younger individuals. Therefore, as the overall population ages, healthcare spending also increases. For example, increasing age by 20 years would increase the cost of inpatient and ambulatory care by 20% and medication costs by 105%.²⁹ However, the aging of the overall population is modest from one year to the next, so while it may have a long-term impact on costs, it does not significantly contribute to spending increases from year to year.

Impact of Rising Healthcare Costs on Health Insurance Premiums

The increase in the underlying healthcare costs is the primary contributor to the increase in health insurance premiums. However other factors, such as fluctuations in insurance underwriting profits^h and rising numbers of uninsured, can also lead to increased premiums. Studies to determine the effects of the insurance underwriting profits on premiums compared premium increases of fully-insured and self-insured plans. The results found almost no effect of underwriting profits between the Springs of 2004 and 2005. However, underwriting profits grew substantially between 2003 and 2004 when premiums increased 11.2%, but medical claims expenses only rose 7.4%.⁷⁸

The rising number of uninsured individuals also leads to increased costs for those with insurance coverage, as the costs of treating the uninsured are shifted to those with insurance coverage. One study found that the cost of uncompensated care received by the uninsured will be valued at over \$1.3 billion in North Carolina in 2005 (\$43 billion, nationally). These costs will be borne by insured individuals. The effects of these uncompensated costs in North Carolina increased 2005 premium costs for employer-sponsored insurance by \$438 for individuals and \$1,130 for families. This burden for uncompensated care is much higher than surrounding states where the individual costs increased by \$277 in Virginia, \$272 in Tennessee, \$275 in Georgia, and \$202 in South Carolina. It is also higher than the national average of \$341 for individuals and \$922 for families.³¹

One of the most closely watched measures of changing healthcare costs is the national Mercer/Foster Higgins survey of health benefit costs among public and private employers. This survey represents 600,000 employers with at least 10 employees and

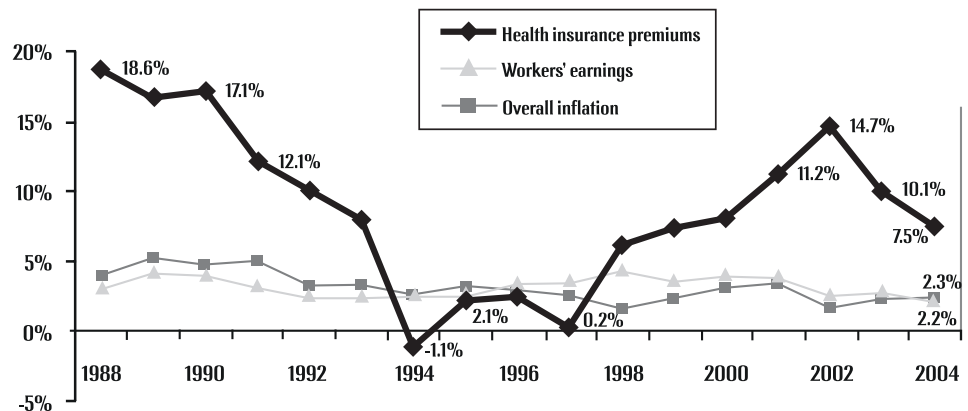
^h The underwriting cycle is pattern of underwriting gains and losses, reflecting insurers' strategies either to undercut premium prices to gain market share or to increase premium prices to boost profitability. The underwriting cycle led to large swings in insurance prices in the 1980s, which became more muted with the advent of managed care in the 1990s. A recent study of the health insurance underwriting cycles suggests that the swings will continue to be muted, as consolidation in the health insurance industry will lead to less price competition, and better price forecasting ability enables insurers to set premium prices closer to actual healthcare costs. Grossman JM, Ginsburg PB. As the health insurance underwriting cycle turns: What next. *Health Affairs* 2004;23(6):91-102.



more than 90 million full- and part-time employees.ⁱ Chart 4.4 illustrates changes in the total cost of healthcare benefits from 1988 to 2004.³ With the exception of a few years of modest increases during the mid 1990s, the cost of health insurance premiums substantially increased each year since the late 1980s. Healthcare inflation increased at a greater pace than the general rate of inflation. Recently, those increases have moderated and in 2004, benefit cost increases were 7.5%, down from increases of 10.1% and 14.7% in 2003 and 2002, respectively. While still significantly above inflation, it is the lowest annual increase in five years. However, there is concern that this recent moderation in benefit cost increases underestimates the true cost escalation in the healthcare system. Rather than increasing premiums, many employers have shifted some of the healthcare costs to employees through increased out-of-pocket expenses, such as deductibles and copays. Chart 4.4 does not reflect the total increase in healthcare costs because it does not include out-of-pocket expenses.

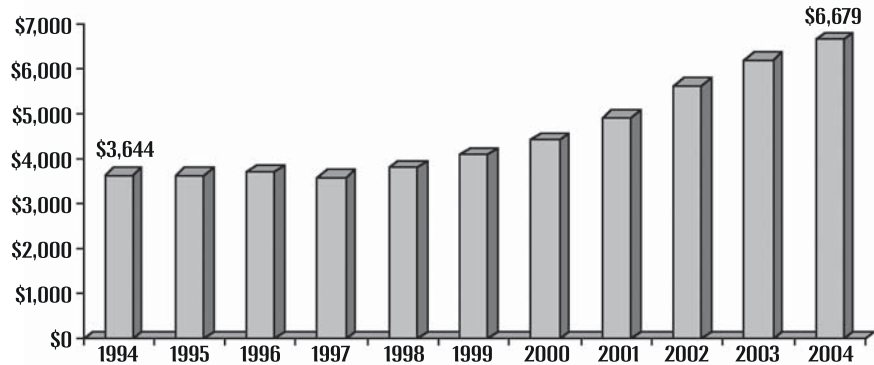
The survey also reports total health benefit cost per employee, which steadily rose over the past ten years. Cost per employee, as presented in Chart 4.5, includes both the premium paid by the employer as well as the portion paid by the employee, but it does not include changes in out-of-pocket costs.³ Excluding out-of-pocket expenses, the total annual cost per employee in 2004 (\$6,679) was nearly twice as much as in 1994 (\$3,644).

Chart 4.4
Changes in Health Insurance Premiums, Inflation, and Workers Earnings
(United States, 1988-2004)



Source: Mercer/Foster Higgins National Survey. (1988-2004). Wage data from: US Department of Labor. Bureau of Labor Statistics. Average Hourly Earnings of Production Workers, Seasonally Adjusted. April data 2000-2004. General inflation data from: US Department of Labor. Bureau of Labor Statistics. Consumer Price Index. All Urban Consumers. Not Seasonally Adjusted. April data 2000-2004.

i Results of another national survey conducted by the Kaiser Family Foundation (Kaiser) and Health Research and Education Trust (HRET) results in somewhat different estimates of premium increases. For example, in 2004, the Kaiser/HRET study showed an 11.2% increase from 2003. This study includes employers with three or more employees. The Mercer Foster Higgins study also includes public programs. These differences in study design help explain the different estimates of premium increases.

**Chart 4.5****Total Health Benefit Cost per Employee (United States, 1994-2004)**

Source: Mercer/Foster Higgins National Survey. (1988-2004).

Employer Reactions to Cost Increases

Employers have used different strategies to moderate the rising costs of health insurance. A survey of employers conducted by the Kaiser Family Foundation and the Health Research and Education Trust in 2005 reported that employers increased the employee share of individual premiums by 82% from 2000 to 2005, with a 67% increase in the employees' share of family coverage. The average inpatient deductible for a preferred provider organization (PPO) increased 85% since 2000.^{j,32} Hospital-specific deductibles are also becoming more common, with half of all covered workers subject to a hospital-specific deductible. Further, 10% of workers face a separate deductible for drug coverage, and multi-tier cost sharing for prescription drugs is almost universal. The multi-tier cost-sharing policy generally requires workers to pay higher co-pays for preferred or nonpreferred brand-name drugs compared to generic drugs.⁸

One fifth of all employers are now offering high-deductible health plans, which have at least a \$1,000 deductible for single coverage or \$2,000 deductible for family coverage. High deductible plans can be coupled with health reimbursement accounts (HRA) or health savings accounts (HSA), which would allow employees to save earnings tax free to cover healthcare costs.^k However, few employers are offering HRA or HSA options in conjunction with the high-deductible plans.

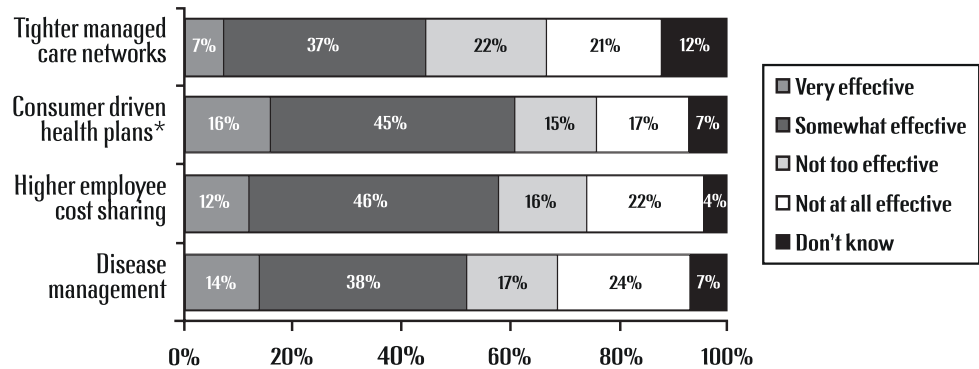
A survey of employers indicates that many believe shifting costs to the employee is an effective way to control rising health insurance premiums (see Chart 4.6).³³ Past studies suggest that higher out-of-pocket costs do deter utilization, but that individuals are equally likely to forgo necessary care and unnecessary care.³⁴ This is a particularly

j In many plans, certain health services are excluded from the deductible. For example, insured individuals in copayment plans generally do not have to pay a deductible for physician visits. Almost two thirds (63%) of insured workers belong to plans that exclude certain preventive services from the deductible.

k Health Reimbursement Accounts (HRA) are high-deductible policies combined with a pretax spending account. Employers may contribute to the savings account. Employees can use funds to pay for healthcare services; withdrawals are not subject to taxes or penalty if used for healthcare services. Employees may not contribute, and the funds are not portable (e.g., the employee will not have access to the funds after he or she leaves employment.) Health Savings Accounts (HSA) are similar, but both the employer and employee can contribute to the savings account with pretax dollars. Further, the savings account is portable and will follow the employee if he or she leaves employment.

**Chart 4.6**

Employers Opinions on the Effectiveness of Different Cost Containment Strategies (United States, 2005)



Source: Kaiser Family Foundation and Health Research and Education Trust. Employer Health Benefits 2005 Annual Survey. Exhibit 12.5.

*Consumer Driven Health Plans include high deductible plans with a personal or health savings account.

significant problem for low-income people, who are more likely to forgo necessary care and suffer adverse health outcomes. Employers are also trying to control rising healthcare costs by managing high-cost claims. A small percentage of the population accounts for the majority of spending on healthcare. In 1996, approximately 5% of the population accounted for 55% of the spending, and 30% of the population accounted for 90% of the spending. This trend has been consistent over time.³⁵ (see Table 4.3)

Table 4.3

Distribution of Healthcare Spending (United States, 1996)

| Expenditures | Share of total healthcare spending |
|--------------|------------------------------------|
| Top 1% | 27% |
| Top 2% | 38% |
| Top 5% | 55% |
| Top 10% | 69% |
| Top 30% | 90% |

Source: Berk ML, Monheit AC. The concentration of healthcare expenditures, revisited. Health Affairs 2001;20(2):9-18.

People with chronic conditions are included in the high-cost groups, and many employers are trying to manage the high costs of chronic conditions through disease management (DM) programs. More than four fifths of covered workers (81%) are in a plan that uses case managers to manage high-cost claims. More than half (56%) of all workers with employer-sponsored health insurance are in a plan with at least one disease management program. Of those covered by disease management programs, most workers are covered by programs that manage diabetes (99%), asthma (86%), hypertension (82%), and high cholesterol (66%).³⁶ Fifty-two percent of employers surveyed in 2005 indicated that disease management was a very or somewhat effective strategy to control rising healthcare costs,³³



although a review of studies examining the return on investment of disease management programs shows mixed results.^{1,37}

Increased Premiums and the Impact on the Uninsured

In the 1990s, rising health insurance premiums accounted for more than half of the increase in the percent uninsured across the nation.³⁸ More than half (55%) of the uninsured in North Carolina reported that they lacked health insurance coverage because it was too expensive.³⁹ In 2005, the average annual premium in North Carolina for an individual was \$4,097 and for families was \$10,570.³¹

Although the charge to the Task Force was to develop options to expand health insurance coverage to the uninsured, the Task Force was cognizant of the need to reduce overall healthcare spending. Without meaningful cost containment efforts, healthcare costs will continue to increase and lead to more uninsured. The Task Force developed proposals to reduce healthcare premiums through reduced benefit packages and more consumer cost sharing. The limited benefit plans focus on primary care and preventive services in order to diagnose and treat patients in the least costly healthcare setting. Many of the proposals also include disease and case management initiatives, to help people with high-cost health conditions better manage their health. Additionally, the Task Force also wants to reward healthy lifestyles, so several of the proposals have included reduced premiums for nonsmokers and have included suggestions about how additional lifestyle incentives can be included in the programs in the future.

The Task Force members realized that additional work was needed to identify strategies to reduce healthcare spending and, ultimately, health insurance premiums. Therefore, the Task Force recommends:

Recommendation 4.2: The NC General Assembly should create a study commission to identify other ways to reduce the growth in healthcare costs to lower overall costs for private and public healthcare plans.

1 A recent Cornell-Medstat study was unable to determine whether disease management programs deliver a return on investment. A review of 44 studies analyzing the economic impact of DM programs found mixed results for those targeting depression, diabetes, and asthma, which are the most common diseases targeted. However, those programs targeting congestive heart failure and multiple chronic conditions were more likely to be successful.³⁷



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